



Proceedings of the Summit on ANSAs

Understanding Strategic Roles and Operational Dynamics

James W. Moore

Quan Lam

Karen Richards

This Technical Note is an informal publication of Defence R&D Canada - Toronto, and the contents do not necessarily have the approval or endorsement of Defence R&D Canada, the Department of National Defence or the Government of Canada.

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Technical Note DRDC Toronto TN 2010-185 November 2010



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1 The Summit Workshop

1.1 Introduction

The Adversarial Intent Section (AIS)¹ at DRDC Toronto has undertaken a Technology Investment Fund (TIF) Project entitled "A Conceptual Framework for Understanding Armed Non-state Actors (ANSAs): Strategic Roles and Operational Dynamics". TIF Projects are forward-looking, high-risk – but potentially high-payoff – research endeavours conducted under the auspices of Defence Research & Development Canada (DRDC), the science and technology (S&T) agency of the Department of National Defence (DND), Canada.

The aim of this three-year (plus one) Project is to advance our understanding of:

- The **strategic roles** of ANSAs in the context of violent intergroup conflict; and,
- The **operational dynamics** that is, the group structures, functions and processes of ANSAs, in both their internal and external aspects, that facilitate the performance of these roles.

Broadly speaking, we seek to shed some light upon what ANSAs do and why they do it, situating their motivations, intent and behaviours in the wider context of violent intergroup conflict.

This Technical Note summarizes the presentations and discussions at a workshop entitled "Summit on Armed Non-state Actors (ANSAs): Understanding Strategic Roles and Operational Dynamics", held at DRDC Toronto, October 26-27, 2010. This workshop was the culmination of Phase 1 Conceptual Development of the TIF Project's three-phase research program, and brought together potential Canadian Forces (CF) stakeholders with DRDC, academic and international defence and security science experts (see Annex A for a list of workshop participants) to report on the research findings generated in this first phase and to chart the way forward in Phase 2 Framework Calibration and Practicum. Specifically, we asked the stakeholders, from their perspective, have we got it right? Are we moving in a direction that will yield practical results for military operators in future counterinsurgency (COIN) and peace support operations? Put simply, what do stakeholders need to know about ANSAs in order to better do their jobs?

We also engaged the stakeholders and our defence and security science colleagues in an exchange of ideas on a question that bedevils research efforts in this field: How do we, as defence science researchers, collect data on hostile or potentially hostile non-state actors operating in high-risk, non-permissive environments, especially when the military organizations of which we are a part are actively engaged in violent conflict with these actors? What novel research strategies and methodologies can we design in order to overcome the daunting challenges we face in conducting research in this field? Some of the standard research methodologies, such as participant observation, are simply not available to us: al-Qaeda in the Arabian Pensinsula, for instance, is unlikely to allow us to dispatch a researcher to observe first-hand its activities in Yemen.

1

¹ Editor's Note: Following a DRDC Toronto reorganization in March 2011, the name of the Adversarial Intent Section was changed to the Socio-Cognitive Systems (SCS) Section.

As to its structure, the Technical Note consists of two major components: (1) the session slide presentations and associated speaking notes (where available); and, (2) synopses of the Question and Answer (Q&A) periods that followed the presentations. As for the latter, it should be emphasized that these synopses are not verbatim transcripts, nor are they exhaustive records of all the comments or ideas aired in the discussions. It is difficult to transcribe the rich spontaneity of a vigourous intellectual conversation into a coherent written narrative. Consequently, I have clustered together remarks on the major themes that emerged over the course of each Q&A session. These are based upon my personal recollection of the discussions and the careful and extensive notes taken by the sessions' notetakers, Quan Lam and Karen Richards (AIS/DRDC Toronto). The synopses are my interpretation of the essential points of the discussions, an interpretation for which I alone am solely responsible. If I have misunderstood or (unintentionally) misrepresented any points that were made, I apologize in advance and ask that any clarifications and corrections be communicated to me. Finally, the remarks in the group discussions are reported without attribution, apart from those of the presenter(s) in each session, as per Chatham House rules, and do not represent the official views of the institutions of which the workshop participants are members.

1.2 The Workshop Agenda

Summit on Armed Non-state Actors (ANSAs): Understanding Strategic Roles and Operational Dynamics (Final Agenda)

Tuesday	October 26	2010 - 9am	to 4	nm
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0830-0915	Registration
0915-0930	Keith Stewart, DRDC Toronto Welcome
0030-0045	James Moore, DRDC Toronto
0000 0010	Understanding ANSAs: Project & Workshop Overview
	Oliderstanding Artors. I Toject & Workshop Overview
004E 404E	Matthew Lauder, DRDC Toronto
0940-1040	
	Project Hydra: Using Red Teams to Better Appreciate
	Socio-cultural Variables in ANSAs
1045-1100	Break
1100-1200	James Moore, DRDC Toronto
	The Strategic Roles of ANSAs: From Spoiler to Partner
1200-1315	Lunch
1315-1415	Don Taylor (McGill University)/Michael Wohl
1010 1110	(Carleton University)/Mike King (McGill University)
	The Motivated ANSA: Collective Identity Under Threat
	The mouvaied ANSA: Collective identity Under Threat
1415 1420	Db
1415-1430	break
1430-1530	Eduardo Salas (University of Central Florida)
	Decisions under Fire: Insights on ANSAs from
	the Science of Team Decision Making
1530-1600	Day 1 Summary
1830-	Dinner

Wednesday October 27, 2010 - 9am to 12:15pm

Note:

- 1. See Annex B for the presenters' bios.
- 2. The Taylor/Wohl/King and Salas presentations are based on the Phase 1 reports the two research teams prepared under contract with DRDC Toronto:
- Taylor, D., Wohl, M., King, M. & Etemadi, P. (2010). The psychology of violent conflict in failing states: A review of the scientific literature. Royal Institution for the Advancement of Learning – McGill University, Montreal, Quebec. DRDC Toronto CR 2010-186. Defence R&D Canada – Toronto.
- Salas, D., Shuffler, M.L. & Grossman, R. (2010). A framework of factors influencing ANSA decision making. Institute of Simulation and Training – University of Central

Florida, Orlando, Florida, USA. DRDC Toronto CR 2010-187. Defence R&D Canada – Toronto.

These reports are available from DRDC Toronto upon request or from the DRDC website at http://pubs.drdc-rddc.gc.ca/pubdocs/pcowl_e.html.

2 Day One – Tuesday October 26, 2010

2.1 Session One – Welcome (K. Stewart)

Keith Stewart, Section Head, Adversarial Intent Section (AIS), DRDC Toronto, officially welcomed the participants to the workshop and thanked them for coming, on behalf of the new Director General of the Centre, Dale Reding. He provided an overview of DRDC Toronto², one of nine research centres of Defence Research & Development Canada, the agency mandated to undertake science and technology research for the Department of National Defence (DND) Canada. DRDC Toronto grew out of the Defence and Civil Institute of Environmental Medicine (DCIEM), and focuses on human and social sciences in six scientific domain sections:

Aerospace and Undersea Medical Sciences Centre (AUMS)

Conducts specialized medical assessments of military personnel, evaluates issues involving life support in austere operational environments, and conducts training in undersea and aerospace medicine for the CF.

• Individual Readiness Section (IR)

Conducts integrated human research that optimizes individual readiness in austere operational environments for the CF and national security partners, and provides leadership in developing and validating pioneering concepts in measuring physical, mental and emotional resilience.

• Human Systems Integration Section (HSI)

Provides the CF and national security partners with human systems integration plans and solutions.

• Collaborative Performance and Learning Section (CPL)

Undertakes an integrated science and technology program that clarifies the basic principles of human collaboration, skills acquisition and maintenance, sets this knowledge base within the context of the contemporary operating environment and likely futures, and exploits this enhanced understanding to generate solutions for defence and security partners.

• Human Effectiveness Experimentation Centre (HEEC)

Enables the CF and national security elements to exploit the full potential of DRDC's human effectiveness science and technology by generating and maintaining the strategic R&D facilities needed for knowledge and technology creation by DRDC Toronto and its

² Editor's Note: This overview describes the structure of DRDC Toronto prior to the reorganization in March 2011.

partners, and by transferring that knowledge and technology for implementation by the CF and national security partners.

Last and most importantly from the standpoint of this workshop:

Adversarial Intent Section (AIS)

Provides defence and security with the means of forecasting and countering hostile intent based on knowledge of the psychological and social factors that motivate and shape individual and collective human behaviour.

Mr. Stewart explained that the purpose of AIS, its mission, is a new one in DRDC. Previously, in the human sciences, we focused on the Blue force and the Red force as the mirror image of Blue in intelligence gathering and operations. The last twenty years have affirmed that all bets are off in that regard. We now consider the whole campaign space, not just the Blue, and there is a whole range of other actors, in all colours of the rainbow, to encompass what we mean by 'Red' or the 'adversary'. In order to enhance this new domain, AIS has psychologists, an anthropologist, modeling expertise, political science expertise and a growing multidisciplinary team. We focus on a broad spectrum of research, from CF capabilities to support for intelligence analysis to issues of psychology and radicalization. Our aim, Mr. Stewart concluded, is to be holistic and strategic in our S&T endeavours.

2.2 Session Two – Understanding ANSAs: Project & Workshop Overview (J. Moore)

2.2.1 Project Overview

Editor's Note: I have taken the liberty to expand upon the Project Overview as presented at the workshop. Given the time restrictions for the session, I was unable to provide a comprehensive overview of the Project. What follows here greatly enlarges the essential elements of the original workshop presentation.

The Adversarial Intent Section (AIS) at DRDC Toronto is conducting a Technology Investment Fund (TIF) Project entitled "A Conceptual Framework for Understanding Armed Non-state Actors (ANSAs): Strategic Roles and Operational Dynamics" (Project Code: 10ad08). As background, let us first situate the TIF Project within DRDC's overall S&T research program. The Technology Investment Fund is one of several S&T programs, and has been established to fund forward-looking, high-risk, but potentially high-payoff, research projects. TIF Projects are located in the nascent domain of the overall S&T program, at the nexus of Future Operational Concept (CF Capability Maturity axis), and Research & Discovery (S&T Maturity axis) (Figure 1):

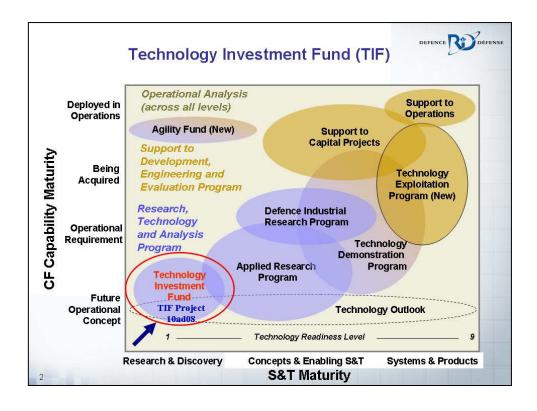


Figure 1. DRDC S&T Research Programs

This reflects the broad remit of TIF Projects, which is to aggressively push the boundaries of our knowledge base, consistent with DRDC's mission in providing S&T support to the Canadian defence and security community.

The Project code is 10ad08³. What exactly does this mean? The breakdown of this designation is represented in Figure 2:

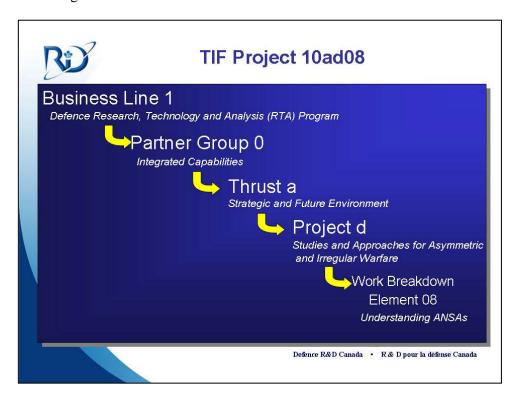


Figure 2. TIF Project Designation

The Research, Technology and Analysis (RTA) Program, or Business Line 1, comprises six areas of activity, known as Partner Groups. This TIF Project falls under Partner Group 0 – Integrated Capabilities. (The other five are: 1 – Maritime, 2 – Land, 3 – Air, 4 – Personnel, and 5 – Command, Control, Communications, Computers, Intelligence, Surveillance and Reconnaissance (C4ISR).) Each Partner Group is structured into S&T Thrusts, which are composed of multi-year projects and tasks. In Partner Group 0, there are four Thrusts:

- a) Strategic and Future Environment;
- b) Capability Based Planning (CBP), Force Structure and Costing;
- c) Special Operating Forces Command (SOFCOM); and,

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³ Editor's Note: Project 10ad, TIF Project 10ad08's nominal "parent", formally ended on 31 March 2011. The "orphaned" TIF has since been assigned the placeholder designation of 10az01.

d) Hazard Protection.

Each thrust addresses a broad spectrum of S&T gaps from the near to long-term and engages teams of R&D staff and external partners, including academia, industry and allies. Within Thrust (a) Strategic and Future Environment, nine projects and tasks are ongoing (as of this writing), including Project (d) "Studies and Approaches for Asymmetric and Irregular Warfare". This is the project to which the TIF Project has been assigned, as Work Breakdown Element (WBE) 08. However, the Technology Investment Fund, which provides the financial resources for the Project, is separate from the Partner Group. This means that the TIF Project is effectively autonomous from its nominally parent project.

The goal of the umbrella Project 10ad is:

To examine conceptual and scientific issues related to irregular warfare and to draw lessons from past and contemporary experiences so as to derive findings that are relevant to the CF current mission in Afghanistan. The central research question associated with this project is: How can an insurgency be defeated?

Consistent with that goal, the overall research objective of this three-year (plus one) TIF Project is to advance our understanding of the motivation, intent and behaviour of Armed Non-state Actors (ANSAs) (see the Project Quad Chart in Figure 3):

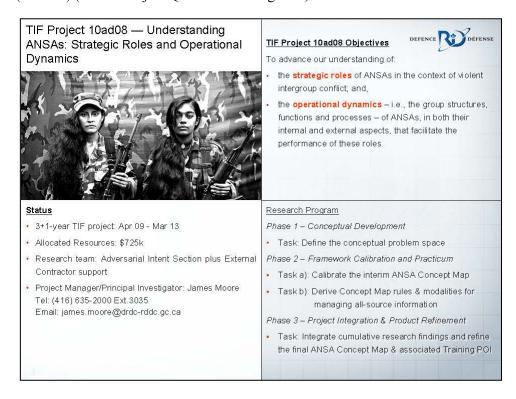


Figure 3. Project 10ad08 Overview

Specifically, we seek to broaden and deepen our appreciation of:

- The **strategic roles** of ANSAs in the context of violent intergroup conflict; and,
- The **operational dynamics** that is, the group structures, functions and processes of ANSAs, in both their internal and external aspects, that facilitate the performance of these roles.

Broadly speaking, we seek to shed some light upon what ANSAs do and why they do it, situating their motivations, intent and behaviours in the wider context of violent intergroup conflict.

This TIF Project is a natural complement to another project ongoing within the Adversarial Intent Section: Applied Research Project (ARP) 15ag "Enhanced CF Influence Operations". Clearly, in order to successfully influence an adversary, one must understand how the adversary thinks. The knowledge base developed in the context of this TIF Project, together with the insights gained in the influence project, will serve as the foundation for future research efforts to elaborate non-kinetic influence activities in the context of violent intergroup conflict in the future security environment.

Why are we concerned with bettering our understanding of ANSAs in their strategic roles and operational dynamics? Our interest extends well beyond the mere satisfaction of scientific curiousity. Our quest for knowledge in this investigation is very much instrumental. Quite simply, we seek to improve our understanding so that, in future expeditionary operations, the CF might effectively *deter*, *disrupt* and *deflect* this violent behaviour, and assist in the restoration of some semblance of peace and stability to societies under violent stress. (The "3ds" of strategic effects is missing an essential fourth "d": *defuse*, that is, to ease the tensions or root causes pushing a society towards violent conflict in the first place. In a sense, the "3ds" are *reactive military* effects: they become salient only after conflict has broken out and the CF, along with like-minded partners and allies, has intervened on the ground. Defuse, however, is a *proactive political* effect and, hence, under a comprehensive approach, other government departments such as DFAIT or CIDA arguably should take the lead, with the CF playing a supporting role where appropriate.)

Our motivation for this concern is straightforward, and stems from an admittedly subjective value judgement, that collective political violence, and armed violence more generally, poses a serious threat to human security and social stability. In his 1964 Nobel Lecture, Nobel Peace Prize recipient Dr. Martin Luther King eloquently condemned the resort to violence to effect social change:

I am not unmindful of the fact that violence often brings about momentary results. Nations have frequently won their independence in battle. But in spite of temporary victories, violence never brings permanent peace. It solves no social problem: it merely creates new and more complicated ones. Violence is impractical because it is a descending spiral ending in destruction for all. It is immoral because it seeks to humiliate the opponent rather than win his understanding: it seeks to annihilate rather than convert. Violence is immoral because it thrives on hatred rather than love. It destroys community and makes brotherhood impossible. It leaves society in monologue rather than dialogue.

Violence ends up defeating itself. It creates bitterness in the survivors and brutality in the destroyers. (King 1964)

Box 1. Systemic Relief Valve – Proportional Representation Systems

One key structural factor influencing the level of violence in a society that emerges from the and ethnic-conflict civil-war terrorism. literatures is the type of democratic electoral system (Noricks 2009: 23-4). Violence is less likely in states with proportional representation systems than with majoritarian "winner-takeall" systems (as in Canada). In its Final Report, the Carnegie Commission on Preventing Deadly Conflict notes that, especially in ethnically divided societies with weak traditions of democratic governance and the rule of law, "strict majoritarian democracy can be selfdefeating. Where ethnic identities are strong and national identity is weak, populations may vote largely along ethnic lines. Domination by one ethnic group can lead to a tyranny of the majority, which often gives rise to hatred and sometimes open conflict" (Carnegie 1997: 100). Power-sharing mechanisms such as proportional representation are preferred in so far as they encourage inclusive governing coalitions.

Collective political violence remains, by its very nature, a mechanism for change, however destructive (for further discussion of this point, see Moore 2011). It is important to bear in mind, however, that, in the efforts of local authorities and their external partners to counter politicallymotivated violent behaviour, the objective is not to prevent socio-political change per se. Indeed, progressive change, however defined, is essential for the healthy evolution of any society. Rather, the goal is to alter the mechanism of change, to channel the impulse for change of indigenous political forces along nonviolent paths. This makes it incumbent upon local authorities, with the active encouragement of – or, if necessary, pressure from – external partners and the international community, to provide genuine alternative governance mechanisms that incorporate dissident groups into the political process (see Box 1). While individuals and groups within a society may

dispute the motivation(s) underlying demands for socio-economic and political change, or disagree with the prescriptions derived therefrom, these differences should play out in the competitive yet inclusive arena of politics rather than on the conflictual and lethally exclusive field of battle.

This Project seeks to advance the ground-breaking work of two previous survey studies of the social science literature relating to counter-terrorism: the RAND Corporation monograph entitled "Social Science for Counterterrorism: Putting the Pieces Together" (Davis & Cragin 2009), and the US Air Force Research Laboratory (AFRL) White Paper entitled "Protecting the Homeland for International and Domestic Terrorism Threats" (Fenstermacher et al. 2010). As the editorial board of the White Paper expressed it, their collection of papers sought to build upon and augment the RAND monograph, while allowing greater "drill down" in some areas (Ibid.: 6). Likewise, the TIF Project seeks to drill down even deeper along two tracks reviewed in these comprehensive collections: the socio-cultural context of violent intergroup conflict, and ANSA decision making processes (more on this below).

As the title of the Project suggests, what we hope to develop is a *framework for understanding*, setting out selected concepts and constructs deemed important in explaining the phenomenon of ANSAs. A framework is *not* a causal model, though certain components or sub-components of the framework may lend themselves to empirical testing of cause-and-effect relationships. Nor is it a theory. Rather, it is a heuristic or a guide to discovery, the foundation upon which theory is grounded.

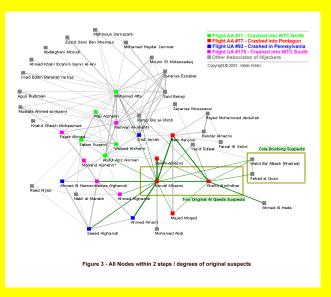
This point cannot be emphasized too strongly. The conceptual framework we aspire to develop in this Project does not pretend to be predictive theory. The entities of interest to us - ANSAs are complex systems (see Box 2). As such, they defy reliable prediction in terms of their behaviours and antecedent motivations and intentions. There are simply too many uncertainties. too many unknowns for highconfidence forecasting. Hence, we must be far more modest in our ambitions. As Davis and Cragin (2009) aptly express it in their Conclusion to the RAND monograph, "the aspiration should be one of anticipating possibilities and improving the *odds* of correct predictions, as distinct from seeking reliable [original prediction emphasis]" (454).

The Project's approach is interdisciplinary and integrative. This, in itself, is a challenge. As Davis & Cragin (2009) note, the relevant "is literature highly fragmented in at least four ways: by academic discipline, by the divide between theory and empiricism, methodological approach, and by level of analysis" (2). As did the RAND and AFRL studies, this Project tries to bring together the insights from multiple perspectives including psychology, social psychology, sociology,

Box 2. ANSAs as Complex Systems

In general, system complexity can be thought of in terms of three dimensions: the nature of the units; the nature of the interactions; and the nature of the forcing or energy input. As to the first, complex systems typically consist of large numbers of units with complex internal structures, units that need not be identical nor have strictly defined roles within the system. Second, these units interact strongly and, often, nonlinearly in a web of mostly unknown relations; moreover, random elements and external 'noise' frequently act upon these interactions. Finally, complex systems are typically out-of-equilibrium; external changes or perturbations force the system away from its steady state (Amaral & Ottino 2004: 149).

In what sense, then, is an ANSA a complex system? The 'units' of an ANSA are its members, individuals with their own complex personalities that uniquely shape their cognitions, emotions and behaviours. Their roles within the group – as leader or follower, instigator or perpetrator, activist or sympathizer, etc. – are fluid; members may assume different roles at different times depending upon their abilities, skills, experience as well as the group's needs (e.g., to replace role occupants lost through attrition) and structure (roles are more fluid in loose networks as opposed to hierarchical organizations). Moreover, the web of interactions within an ANSA are exceedingly tangled. Consider, for example the two-step network analysis for only two of the 19 9/11 terrorists, Nawaf Alhazmi and Khalid Almihdhar (Krebs 2008):



As the degrees of separation increase and the number of individuals within the group multiplies, one can easily imagine how this web of links will explode. Finally, ANSAs are continually 'out-of-equilibrium', engaged as they are in a constant and deadly struggle for political and physical survival in their environment, i.e., against government counterinsurgent and counterterrorist forces as well as other competing non-state actors.

cultural anthropology and other social science disciplines – to help us better understand ANSAs. We seek not merely to line up these theoretical and empirical insights in a row of disciplinary stovepipes, but, rather, to effectively integrate them in a comprehensive framework.

To this end, we adopt, as did the RAND project, a systems perspective to the study of ANSAs, a non-reductionist approach in which we seek to craft a holistic description of these groups. In the course of this, we may reduce the system to its components to facilitate description and analysis. However, in contrast to the reductionist approach, a systems perspective recognizes that the whole is not simply the sum of its parts, and that it is not enough to describe the parts in isolation in order to understand the system. One must describe the more-often-than-not complex and nonlinear relationships between the parts in order to grasp the higher-level systems effects (Altmann & Koch 1998: 183; Masys 2007: 2). As complex systems theorist Julio Ottino writes, "The very essence of the system lies in the interaction between parts and the overall behaviour that emerges from the interactions" (Ottino 2003: 293).

Moreover, complex systems such as ANSAs must be considered in the context of their environment and their interactions with that environment. This drives home the point that there can be no generic model of an ANSA, all elements of which are equally relevant to all such actors in every conceivable circumstance. This is one of the key findings to emerge from both the RAND and AFRL studies. As the White Paper notes, no "one size fits all" with respect to terrorism and Violent Non-state Actors (VNSAs) (Fenstermacher et al. 2010: 7). Quite simply, context matters. The RAND monograph states this even more strongly: "Centrality of context is a first principle and establishing context should be the first order of business in organizing thought" (Davis & Cragin 2009: 1). The framework we hope to develop will be, in the first instance, an acontextual conceptual architecture, setting out the range of key factors and variables that have been identified as relevant to the description and analysis of ANSAs, without prejudging or predetermining the relative importance or weight that can or should be assigned to each factor or to their interrelationships. This, though, is just the point of departure. In its practical application, the components and sub-components of the framework will necessarily be tailored to the unique circumstances of the particular ANSA under scrutiny. In practice, the framework will be – indeed, must be – case-specific and context-dependent.

With respect to the Project's research program, three Phases are envisaged:

Phase 1 Conceptual Development

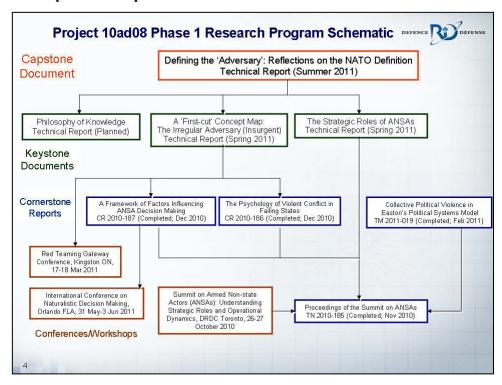


Figure 4. Project 10ad08 Phase 1 Research Program Schematic

The task in Phase 1 is, in broad terms, to define the conceptual problem space of the Project, subsequently set out in a series of documents and reports. The Capstone Document elaborates the crowning construct of the Project – the concept of 'adversary', of which the Armed Non-state Actor (ANSA) is a sub-category. The Keystone Documents comprise three interlocking treatises, the first setting out the scientific worldview that buttresses the research program; the second offering a typology of the grand strategic and strategic roles ANSAs play in the context of violent intergroup conflict; and the third presenting a 'first-cut' multicomponent Concept Map of the CF's manifest concept of an Irregular Adversary (Insurgent) [IA(I)]. The Cornerstone Reports lay the foundation for remodeling the IA(I) Concept Map to create an interim ANSA Concept Map, in light of the theoretical, experimental and empirical insights leveraged from the social sciences. For this, two world-class academic teams were contracted to undertake integrative reviews of the scientific literature, "drilling down" deeper into two components or sub-maps of the IA(I) Concept Map: the Social Conflict, and Strategic Decision Making Processes blocs. The results of these efforts were presented in the culminating event of this Phase: the "Summit on Armed Non-state Actors", held at DRDC Toronto from October 26-27, 2010.

Phase 2 Framework Calibration and Practicum

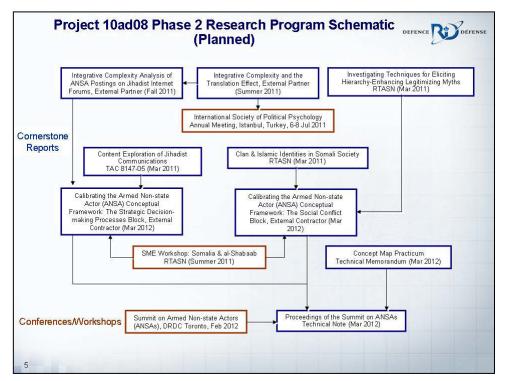


Figure 5. Project 10ad08 Phase 2 Research Program Schematic

The primary task in Phase 2 will be to calibrate the interim ANSA Concept Map. A test case will be used as a measurement standard against which to check the relational propositions of the Concept Map. The calibration exercise will not in any sense "prove" the Concept Map; one test case does not a Concept Map confirm. Rather, it will enable us to revise and refine the Concept Map (in Phase 3) such that we can have increased confidence in the overall soundness of the final version.

The calibration case study will be the Somali Islamist ANSA, al-Shabaab. Why al-Shabaab? Somalia is an area of increasing concern for Canada and the international community at large. The turmoil of its interminable civil war, the threat of spill-over from that conflict into neighbouring countries, tragically highlighted in the horrific twin bombings in the Ugandan capital of Kampala during the July 2010 FIFA World Cup final for which al-Shabaab claimed responsibility, and the ever-increasing activities of pirates in the international sea lanes off the Horn of Africa, have pushed Somalia and the actors, both foreign and indigenous, embroiled in that tragedy to the forefront of international concern. As Somalia expert Kenneth Menkhaus writes, "Whereas in the past the country's endemic political violence – whether Islamist, clanbased, factional, or criminal in nature – was local and regional in scope, it is now taking on global significance" (Menkhaus 2008: 1).

Developments in that country are of especial concern to a significant segment of the Canadian population. Canada is home to one of the largest Somali diaspora communities in the Western

world, estimated at up to 200,000 residents, with the heaviest concentrations located in Toronto and Ottawa. Somali-Canadians are deeply concerned with the disastrous ongoing conflict in Somalia, and with the spill-over of that conflict into their own communities in Canada, in particular, with the efforts of extremist organizations such as al-Shabaab to radicalize and recruit Somali-Canadian youth. (The Canadian Friends of Somalia recently organized a conference on youth radicalization, "Promoting Peace and Preventing Somali-Youth Radicalization Worldwide", held in Ottawa, December 6-7, 2010.)

Nor is the CF a disinterested bystander. It is directly involved in regional security operations through Operation SAIPH, two of its primary tasks being counter-piracy and counter-terrorism in the North Arabian Sea, the Persian Gulf and the waters around the Horn of Africa:

Box 3. Piracy on the Rise

In its latest piracy report, the International Chamber of Commerce (ICC) International Maritime Bureau (IMB) reported that hijackings off the Somalia coast accounted for 92% of all ship seizures in 2010, with 49 vessels hijacked and 1,016 crew members taken hostage. As of 31 December, Somali pirates still held some 28 vessels and 638 hostages for ransom. According to Captain Pottengal Mukundan, Director of the IMB's Piracy Reporting Centre, the solution to the piracy problem lies in "developing workable administrative infrastructures [in south central Somalia] to prevent criminals from exploiting the vacuum left from years of failed local government. All measures taken at sea to limit the activities of the pirates are undermined because of a lack of responsible authority back in Somalia from where the pirates begin their voyages and return with hijacked vessels." (ICC 2011).

• Counter-piracy

The Canadian Navy has conducted counter-piracy operations in the Gulf of Aden and off the Horn of Africa since August 2008. Currently, these operations are carried out by Standing NATO Maritime Group 2 (SNMG 2) under Operation OCEAN SHIELD, the Alliance's contribution to international efforts to suppress piracy off the Horn of Africa, that began in August 2009 (MANW-NATO 2011). The CF has also deployed a team of specialists (Task Force Northwood) to Maritime Component Allied Command Headquarters Northwood in England to liaise between NATO naval forces and the international shipping industry in order to ensure the safety of merchant shipping and naval vessels off the Horn of Africa (CEFCOM 2010b).

Counter-terrorism

The Canadian Navy has been involved in maritime security and counter-terrorist operations in the region beginning with Operation APOLLO in October 2001. Currently, these operations are conducted in the multinational context of Combined Task Force 150 (CTF 150), led by Commander, US Naval Forces Central Command (US NAVCENT) as part of Operation ENDURING FREEDOM (Ibid.; CEFCOM 2010a).

Most recently, from October 25, 2009 – April 8, 2010, the Halifax-class frigate HMCS *Fredericton* (Task Force Saiph Roto 0) conducted counter-piracy operations off the Horn of Africa with SNMG 1 and counter-terrorism operations in the North Arabian Sea with CTF 150 (CEFCOM 2010b).

In Phase 2, we will continue to "drill deep" into the social conflict and decision making Concept Map blocs. Two contracts will be let for FY11/12 to calibrate these components of the interim ANSA Concept Map. Pending the award of these contracts, several preliminary studies employing a variety of research approaches and methodologies are underway that will feed into

these calibration studies. This triangulation of approaches and methods – including Integrative Complexity analysis; ethnographic and knowledge elicitation techniques; decision support red team methods and approaches; and, automated textual content exploration – will compensate for the limitations inherent in each, and will facilitate the identification of commonalities across sources, allowing for the extrapolation of key information relevant to al-Shabaab and Somali collective identities as well as al-Shabaab decision making processes.

As well as a heuristic, the ANSA Concept Map is also intended to be a knowledge management tool. Thus, a secondary task in Phase 2 will be to undertake a Concept Map Practicum, a practical study or research exercise in which rules and modalities for using the ANSA Concept Map to organize all-source information on our test case ANSA, al-Shabaab, will be derived.

As in Phase 1, the results of these various efforts will be presented to the defence and security community in the culminating event of this Phase, the second "Summit on Armed Non-state Actors", to be held at DRDC Toronto in February 2012 (tentative date).

Project 10ad08 Phase 3 Research Program Schematic (Planned) Phase 1 Documents & Reports Cornerstone Phase 2 Studies & Reports Reports Project Integration & Product Refinement, External Contractor (Fall 2012) ANSA Concept Map ANSA Training Product Concept Mapping Conference, Valletta Malta, Sep 2012 Proceedings of the Summit on ANSAs Technical Note (Fall 2012) Summit on Armed Non-state Actors (ANSAs), DRDC Toronto, Fall 2012 TIF Project Final Report (Winter 2012/2013) Conferences/Workshops Monograph/Edited Volume (2013)

Phase 3 Project Integration and Product Refinement

Figure 6. Project 10ad08 Phase 3 Research Program Schematic

The principal tasks in Phase 3 will be to integrate the cumulative findings of the research carried out in the preceding two phases, and to refine the key product planned to come from this research endeavour: the ANSA Concept Map and its associated Training Program of Instruction (POI). Specifically, we will bring together the insights derived from the conceptual inquiries carried out in Phase 1 with the results of the calibration study and practicum conducted in Phase 2 to refine the final ANSA Concept Map. (This version of the Concept Map will be "final" in the sense that

it is the end product of this specific Project. Clearly, the Concept Map will – and must – continue to evolve to reflect future theoretical, experimental and empirical advances in the social sciences generally, and the experience gained in the practical application of this tool.)

The final ANSA Concept Map will serve two principal functions. First, it will be a heuristic tool or guide to discovery, facilitating the development of a broad knowledge base of the contemporary operating environment in support of future CF COIN and peace support campaigns (see Box 4) in failed or failing states. An effects-based approach to operations is predicated on a sound understanding of each element within the battlespace, "the role they play in the environment, their aims in relation to the campaign and overall success, and the influence they have on other systems within the environment" (DAD 2008: 5-41). Key to this understanding is the development during force preparation and pre-deployment of a **broad knowledge base** of the operating environment. Drawing upon all available resources, the knowledge base provides the commander with an appreciation of the human environment in which the CF will be operating, such that he/she will know "what, who, and how to engage within the campaign to move towards the desired objectives and end state" (Ibid.). (As this pre-deployment knowledge base will undoubtedly be incomplete, it will require continuous analysis throughout the campaign, focusing in particular on the reactions of individuals and groups to the CF's activities and objectives so as to more fully develop the comprehensive intelligence picture.) The ANSA Concept Map can play a significant role in the development of this knowledge base. Encompassing the strategic and operational as well as the material/structural and ideational dimensions of these

Box 4. COIN vs. Peace Support Campaigns

"Counter-insurgency (COIN) is defined as: those military, paramilitary, political, economic, psychological and civic actions taken to defeat insurgency. A COIN campaign is characterized by an insurgent based adversary, the political nature of the crisis, a need to address multiple facets of the environment and root causes of the crisis through a comprehensive approach with the military in an overall supporting role, and a degree of combat that is less than that experienced in a major combat campaign." (DAD 2008b: 3-10)

"A peace support campaign is defined as a campaign that impartially makes use of diplomatic, civil and military means, normally in pursuit of UN Charter purposes and principles, to restore or maintain peace. Such operations may include conflict prevention, peacemaking, peace peacekeeping, enforcement, peacebuilding, and/or humanitarian operations. Their intent is to uphold internationally accepted values, and where possible, act within a mandate is implicit. Governments and military forces, either independently or as part of a coalition, frequently support international responses to emergencies, ranging from humanitarian aid to the use of military force." (DAD 2008b: 3-16)

actors, it will help the military intelligence operator give the commander a more holistic understanding of the ANSAs likely to be encountered in the battlespace.

Second, the ANSA Concept Map will serve as a **knowledge management tool**, as a repository for the all-source information accumulated during the development of the knowledge base. A Concept Map is a powerful knowledge structuring and building tool, serving as a "template or scaffold" to organize and manage the overwhelming mass of all-source information on ANSAs that comes across the operator's desk, and making possible the creation of powerful knowledge frameworks that permit knowledge retention and the use of this knowledge in new contexts (Novak & Cañas 2008: 7). As Cañas et al. (2003) write, "One of the big issues for organizations that have a concern for knowledge management (which is to say, any that want to remain viable), is how to capture and leverage day-to-day, mission critical knowledge. Even the challenge of separating what is critical and narrowly held from that which is widely held or easily attained, is a

difficult problem. It is improbable that a panacea for this problem will be found. However, the capture of conceptual knowledge in a representation such as a concept map, which is extraordinarily easy to create, certainly provides a partial answer" (65). This tool, then, can be used to discover and structure information concerning specific real-world ANSAs, e.g., the Somali jihadist group al-Shabaab, in line with the concepts and propositions of the Concept Map.

To see where such a heuristic and knowledge management tool fits in the CF's Future Operational Concept space (ref. Figure 1 above), let us situate it within one notional construct – the (former) Directorate of Future Security Analysis's (DFSA/CFD) comprehensive framework (circa 2009). This Construct sets out the interaction between CF functions, environments and condition sets, these three elements defined as:

- Condition Set: "The conditions are governed by the assigned missions in CFDS and form the baseline of the expectations of government."
- Strategic Environments: "Where elements of national power and influence can be exercised. This includes both kinetic and non-kinetic effects."
- Strategic Functions: "Strat def [sic] functions are the comprehensive set of discrete activities and actions necessary to mission success" (Aubin 2009).

Within these elements, the ANSA Concept Map would be located at the junction of *Condition Sets*: CFDS Mission 5 – Lead/conduct a major international operation (extended) and CFDS Mission 6 – Deploy forces in response to international crises (short); *Strategic Environment*: Human; and, *Strategic Function*: Sense (see Figure 7, next page).

To elaborate, the ANSA Concept Map tool will contribute to a broader and deeper understanding of the psycho-social and cultural determinants of social influence at the individual, group and societal levels (the Human environment) – the prerequisite for effective non-kinetic influence activities. More specifically, it will assist in the production of *integrated* operational- and strategic-level intelligence (the Sense function) that will inform the planning processes for the effects-based approach to operations, thereby acting as a force multiplier that will provide the CF with decisive advantage over real and potential adversaries such as ANSAs in future CF COIN and peace support campaigns in failed or failing states (CFDS Missions 5 and 6).

Further to this last point, the ANSA Concept Map will support the efforts of the intelligence staffs within CDI, CEFCOM J2, CANCOM J2 and RTF G2 to provide the National Command Authority and mission commanders with the strategic and combat intelligence required for the strategic and operational planning processes, respectively. The CF field manual on intelligence defines **combat intelligence** as "that intelligence concerning the adversary, weather and terrain required by a commander in the planning and conduct of combat operations (DAD 2001: 6). **Strategic intelligence**, on the other hand, is "intelligence which is required for the formation of policy and military plans at national and international levels" (Ibid.: 8). The essential differences between the two types of intelligence are ones of scope and point of view:

"Combat intelligence in a deployed command is concerned primarily with that specific military operation and is normally generated from within, whereas strategic intelligence is more intended to support defence planning at the national

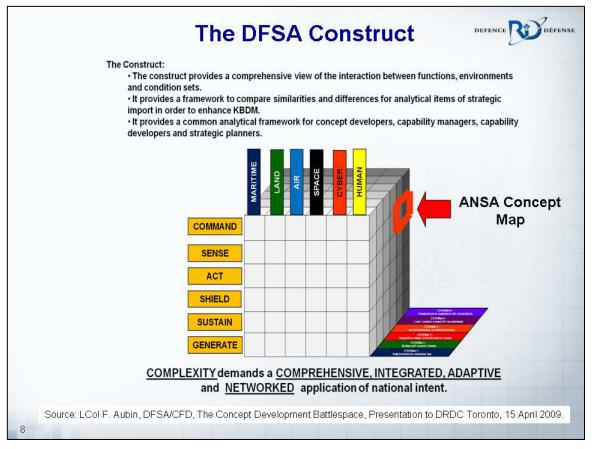


Figure 7. The DFSA Construct (circa 2009)

and international levels. Both are required to provide a complete picture of adversarial activities to a deployed command [emphasis added]. The difference lies in their intended usage, whether the product is to be used to gain a tactical advantage or to provide an estimate as to an adversary nation's [or ANSA's] ability to wage war" (Ibid.: 9).

In this Project, we have taken to heart *FM Intelligence*'s admonition on the need for both combat and strategic intelligence in order to flesh out as complete a picture of the adversary as possible. The final ANSA Concept Map will combine the strategic and operational levels of warfare within a common representational frame, thereby overcoming the level-of-analysis "stove-piping" and compartmentalization that often obscures the emergent linkages and connections between the strategic, the operational and the tactical.

As in the previous two phases, the results of the integration and product refinement exercise in Phase 3 will be presented to the defence and security community in the culminating event of this Phase, the third and final "Summit on Armed Non-state Actors", to be held at DRDC Toronto in late fall 2012 (tenative date). The Final Project Report, summarizing the work undertaken in this

multi-year endeavour, recording its successes (and failures), and providing recommendations for the direction of future research will follow thereafter.

2.2.2 What is an ANSA?

Before we launch into the substance of our sessions, there's one question we first need to address: What is an Armed Non-state Actor (ANSA)? In one respect, this is a unit of analysis question. Who are we referring to – individuals or groups? Of course, nothing in this business is ever straightforward, and it turns out that ANSAs are no exception. This term has been used to refer equally to individuals *and* groups. Thus, it's incumbent upon us as analysts to make clear the unit of analysis, whether individual or group, that we're focusing on when we speak of ANSAs.

Bearing this in mind, I'd like to offer up a working definition of ANSA at the *group* level. Many definitions of the term appear in the literature, a selection of which is presented here:

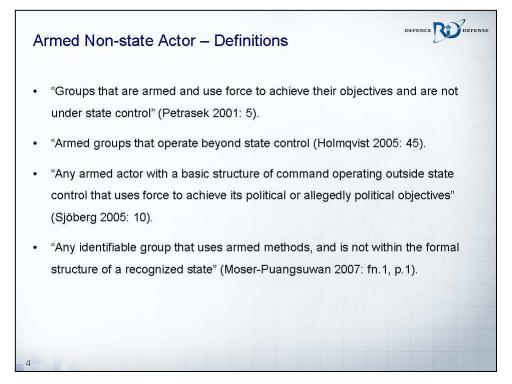


Figure 8. Selected definitions of ANSAs

The similarities in these definitions are immediately apparent. More generally, definitions of ANSAs emphasize four characteristics (ref. Bruderlein 2000: 6-7; Glaser 2003: 20-22; Policzer 2005: 6):

A basic command structure.

An ANSA has a basic organizational coherence, with command structures ranging from loose decentralized structures or networks to unified hierarchies. The key consideration here is the degree of control the command structure provides the leadership over the group, whether it is sufficient to allow the ANSA leadership to exercise a minimum level of restraint over the conduct of its fighters. Of course, al-Qaeda's move from "corporate terrorism" to "terror

franchises", or what Marc Sagemann (2008) describes as "leaderless jihad", calls into question whether this still remains a necessary characteristic.

• *The use of violence for political ends.*

An ANSA uses violence as a means – though not necessarily the exclusive or primary means – to contest political power with governments, their external supporters and/or other non-state actors. The practical political agendas of ANSAs are as varied as the groups themselves. They may seek to protect or advance the interests of their clan, tribe, ethnic or religious community within a national or transnational context. They may seek to overthrow a government or occupational regime, or, more fundamentally, to foment revolutionary change of the national or international political system. They may seek to conquer and control a national territory, or to detach a component region from a larger territorial unit. They may seek to preserve a status quo – or return to a status quo ante – that privileges their political, social and/or economic position or that of the group they claim to represent. Alternatively, they may seek merely to deny political control to others, fostering a state of sustained chaos within which to engage in other, often criminal, pursuits. But, fundamentally, it is the *capacity – that is, the capability and intent – for the use of violence to achieve political ends* that is the main quality distinguishing an ANSA from other social groups.

• *Autonomy from state control.*

An ANSA not only exists outside the formal state institutional structure, but retains the capacity for independent decision. In other words, it is an autonomous entity, not a mere appendage of a state or its security forces; it operates beyond the *responsible control* of the state. While it may actively support and collaborate with a state actor – and receive state support in its turn – this cooperation stems from a perceived coincidence of ANSA and state interests, rather than as a response of the ANSA to the orders of state superiors.

Some degree of territorial control.

An ANSA effectively controls a territory (not necessarily precisely delimited) and its resident population. This domination does not necessarily require a permanent, visible presence. The ANSA's presence may be intermittent, and its control exercised through "hidden" agents embedded in the population (Glaser 2003: 20).

In light of these characteristics, we can frame a short-hand definition of 'ANSA' as:

An autonomously operating planned group that has the capacity to use violence to achieve political ends.

We'll ignore the territoriality requirement – that is, the extent to which an ANSA's aspirations and/or activities are tied to a particular territory – so as to encompass "deterritorialized" or transnational actors within the scope of our definition.

There is a competing term to ANSA out there, the Violent Non-state Actor (VNSA). Mulaj (2009) defines VNSAs as "non-state armed groups that resort to organized violence as a tool to achieve their goals" (1). These two terms, ANSA and VNSA, though similar, are not quite the

same. Mulaj does not qualify "goals" in his definition. Consequently, the term VNSA can apply to a wide variety of violent or potentially violent actors, such as criminal groups, militias, warlords, private security companies and others, pursuing a wide range of goals. That being the case, an ANSA as we have defined it in our working definition – restricting its goals or ends to the political – can be considered a sub-category of VNSAs.

Though as Mulaj's definition makes clear, organized violence is a tool and not necessarily the tool or the only tool to which VSNAs resort, there could be a problem with using this term. Unfortunately, for those not schooled in the subtleties of the terminology that we practitioners take for granted – in particular, our superiors at the policymaking level – the term Violent Nonstate Actor might give the impression of groups that are committed exclusively and single-mindedly to violence. This clouds the fact that not all of these groups are hopelessly irreconcilable and can never under any circumstances change their goals or strategies, in particular, their resort to collective political violence. That's why I personally prefer the term Armed Non-state Actor for the entities in which we are interested. Rather than an invariant strategy or an inherent trait of these groups, it suggests a potential or a capacity for violence to which ANSAs may or may not resort in any given set of circumstances.

2.3 Session Three – Project Hydra: Using Red Teams to Better Appreciate Socio-cultural Variables in ANSAs (M. Lauder)

2.3.1 Presentation

Editor's Note: No speaking notes are available for this presentation.



Project HYDRA: Using Red Teams to Better Appreciate Socio-Cultural Variables in ANSAs

Matthew A. Lauder Adversarial Intent Section, DRDC Toronto

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Presentation Overview

- Setting the context
 - 15AG: Enhanced CF Influence Operations
 - Appreciating the human battle-space enabling capabilities
 - Overview of red teaming research (2008-10)
- USE-CASE and HYDRA (a project within a project)
 - Overview of RT USE-CASE, incl. Project HYDRA
 - Project Structure
 - Research Questions
 - Analytical frameworks

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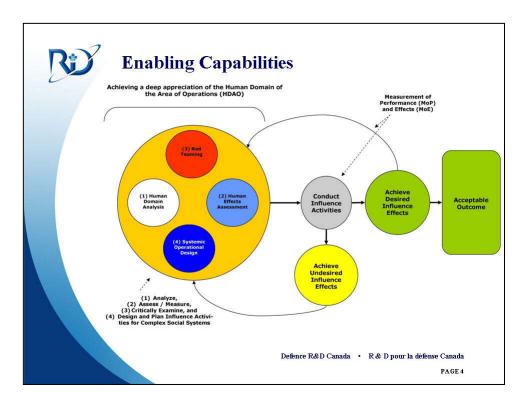


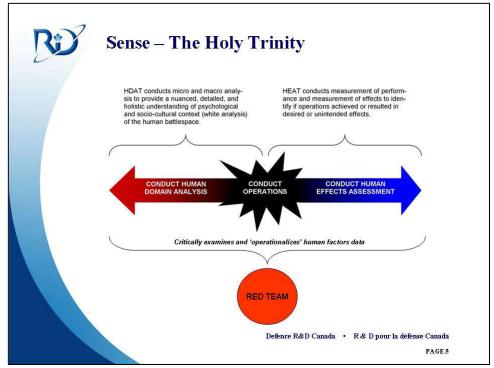
15AG – Overview

- 15AG: Enhanced CF Influence Operations
- 4-year ARP, ending March 2012
- · Boot-strapping project, sets-up more detailed future research
- Objective to enhance the ability of the CF to plan, implement, and evaluate influence operations, at the micro and macro levels, in future expeditionary ops
- Four major components:
 - Development of conceptual baseline (underlying theories of influence and direct / indirect measures of effect)
 - Conducting micro analysis (Sense psychological analysis)
 - Conducting macro analysis (Sense socio-cultural analysis)
 - Designing influence activities (Act sticky messages)

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Red Teaming Research

- Program of research started in earnest in 2008, in response to:
 - Bob Walker's statement (2007), need to explore red teaming
 - PG5 emerging interest in red teaming
 - Request for assistance Games Red Team, JTFG
- · Research synthesized two methodological approaches
 - Ethnography, incl. observation, immersive, and other qual research techniques
 - Grounded-approach, generation of concepts and theory from data vs. testing or validating existing concepts / theories

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Red Teaming Research

- Three Phases
- Phase 1 (08): To examine the extant literature from across public-private sectors, incl. military, law enforcement, and business, development of RT conceptual framework and definition, etc.
- Phase 2 (08-10): To critically examine / participate in red teaming in action
 - Red teaming in FTXs
 - Red teaming in support of planning and operations
 - JTFG, CEFCOM, CJTF 82, DSRT
- Phase 3 (Current, 10-11): To set the conditions for a more detailed RT TDP, test-drive red teaming methods / techniques (red teaming use-case)

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Red Teaming Findings

- Three main findings:
- Rather than a specific technique, red teaming is a broad conceptual category that includes a number of challenge techniques
 - Each of which is suited to a particular audience and environment
- Red teaming is not a one-off or single activity, it is a program or curriculum of activity, aggregation of challenge activities done over a period of time
- Red teaming conceptual category can be divided into two elementary forms:
 - Mimetic / Threat Emulation Red Teaming
 - Diegetic / Decision-Support Red Teaming

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Red Teaming - Conceptual Framework

Red Teaming Conceptual Framework

Red Teaming	Elementary Form	Description	Common Techniques 11	Application
	Diegris Red Teaming (Decision Support Red Teaming)	Narrative based and descriptive account of the real world, usually involves an analytical product	Futures Analysis *Alternative Perspectives *Alternative Perspectives *Red Team Analysis *Competitive Intelligence *Team A Team B *Peer (Critical B Review *Orwit's Advocacy *Attack the White Board *Red Team Table Top Exercises (Red Team Table Top Exercises (Red *Advisory Role *Advisory Role *Milletter Analysis	Can be applied in structured or unstructured environments, such as collaborations, round-table discussions, or one-on-one conversations. These techniques normally support planning or decision-support in operational environments.
	Mimetic Red Teaming (Threat Emulation Red Teaming) ^{BM}	A highly accurate and detailed acting-out or role- playing of the real world	•Red Cell •White and Black Hat Hacking •Opposition Force •Tiger Teams •Penetration Tests •Covert Tests	Usually applied in a highly structured environment, such as a field training exercise. In some cases, these methods may be used to test 'live systems'.

A description of many of the techniques can be found in: "A Guide to Red Tearning," (February 2010), Assistant Chief of the Defence Staff, Ministry of Defence.

If the US has a robust threat emulation program. Threat emulation teams consist of specialists who replicate the contemporary operating environment to strategy, tactics, technology, and equipment. See: Fortenot, G. and Combs, D.L. (Summer, 2009), "Flighting Blue: Why First Class Threat Emulation is Critical to Joint Experimentation and Combab Duevelopment." American Intelligence Journal, pp. 24-00.

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Red Teaming – Techniques

Red Teaming Techniques

Technique	Definition
Futures Analysis	A structured technique to identify alternative futures.
Alternative Analysis	The presentation of ideas outside of the status-quo.
Alternative Perspectives	A range of alternative perspectives on a problem or issue; this technique may incorporate red, green, white, and blue perspectives into an analytical product.
Red Team Analysis	A holistic analysis of the problem or issue using all information available, including open and closed sources.
Competitive Intelligence	A structured approach in which two separate teams analyses the same problem or issue.
Team A / Team B	Another form of competitive intelligence in which the two teams have access to different information.
Peer (Critical) Review	A critical review of products by peers, often used in the academic community (i.e. peer-reviewed publications).
Devil's Advocacy	The intentional challenge of a position from a contrarian perspective.
Attack the White Board	An anything-goes brain-storming session designed to critique underlying assumptions.
Red Team TTX	A table-top exercise designed, executed, and controlled by the red team. Often, the red team leader will serve an omnipresent narrative role and will guide blue through the exercise scenario.
Advisory Role	A form of "soft red teaming," the red team provides expert advice on a problem or issue. In essence, this is a second-look at a problem.
Emulative Analysis	Similar to alternative perspectives, this technique requires an advanced understanding of the adversary's culture, religion, history, geography, social structure, etc.
Red Cell	A team that emulates the adversary in field training exercise environments. The red cell is specially trained and has an advanced understanding of the adversary.
White and Black Hat Hacking	Penetration tests of synthetic systems. White hat hacking is conducted in such a way that it does no harm, whereas black hat hacking is conducted on live systems and could result in system shut-down. White hat hacking is also called ethical hacking.
Opposition Force	A general opposition force to blue in an exercise environment, usually without any special training to replicate the adversary.
Tiger Teams	Specially trained teams to conduct challenge assessment of blue systems or processes.
Penetration Tests	Assessments of blue physical security systems and protocol.
Covert Testing	Similar to penetration tests, but done in a covert fashion.

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Red Teaming – Definition

Red Teaming ... is a dynamic organizational support activity undertaken by a credible team that aims to nurture foresight by creating a collaborative and reflexive learning environment in which the team, through the application of critical methods and techniques, challenges the beliefs, assumptions, and concepts that underpin the planning, structure, and operations of an organization.

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Red Teaming - Attributes

- Five attributes of red teaming
 - Trust and respect RT must establish rapport and build a relationship with blue marked by trust and respect
 - 2. Expertise RT must be seen as an authoritative source of information or capable of accessing / pulling-in expert resources
 - 3. Positional authority RT must be sanctioned at the highest level possible in an organization, requires sufficient 'top-cover'
 - 4. Relative independence far enough away to allow for objectivity, but still close enough to be plugged-in, can't exist on the margins
 - Adaptable and flexible RTing is not a static or prescribed endeavour, it changes according to the audience and the environment

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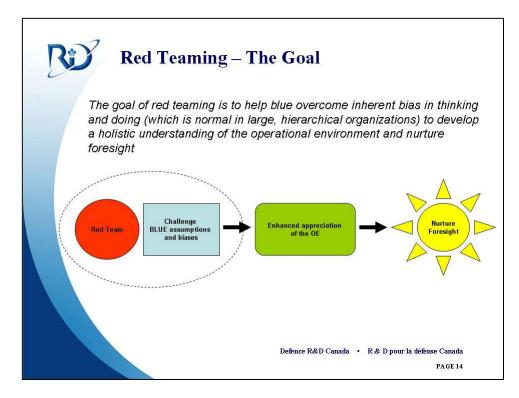


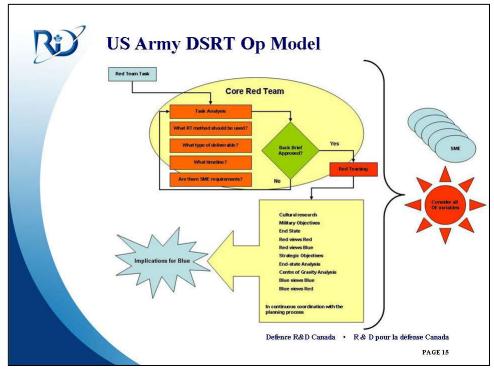
Red Teaming - What Qualifies?

- To qualify as red teaming, three components are necessary:
- 1. The endeavour is undertaken by a credible team
- The endeavour is specifically designed to teach through the application of challenge techniques, and not to assess or validate
- 3. While the form and techniques may vary, red teaming is a learning endeavour that involves a critical, and objective (?), examination of self and others that occupy the problem-space

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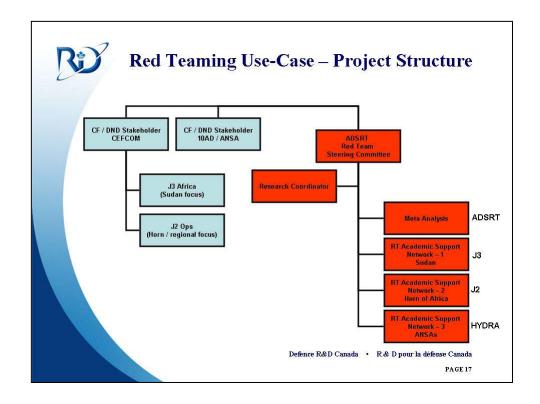


Red Teaming Use-Case

Mission

- The use-case will apply and assess decision-support red teaming approaches to real-world issues or problems faced by the CF / DND, in this case Sudan and the Horn of Africa
- · Specifically, but not limited to ...
 - Alternative Perspectives
 - Alternative Analysis
- Three stakeholders
 - CEFCOM Stakeholder 1 Africa
 - CEFCOM Stakeholder 2 Horn of Africa
 - TIF 10AD Stakeholder 3 ANSA

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Research Problem 1 - Sudan

- Use academic and community-based experts to answer ...
 - "What should a post-referendum UN stabilization mission look like?"
- Address through three activities
 - Internal team: Produce briefing notes supported by PMESII framework (Political, Military, Economic, Social, Infrastructure, and Information)
 - External team: SMEs recruited through academic network will provide short summaries, which will be synthesized to provide AA perspective
 - Diplomatic overview: Discussions with UN diplomats to test / confirm assumptions

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Research Problem 2 - ANSAs

- Use academic and community-based experts to answer ...
 - "How do Islamic and clan identities shape behaviour of Somali groups"
- · Address through the following activities
 - Internal team: Conduct research related to failed-states, secession, and impact of recognition
 - External team: Contracted studies on non-state actors focused on Islamic and clan identity factors

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Research Problem 3 – RT Experimentation

- Use academic and community-based experts to ...
 - Test elements / techniques that might be used to support red teaming
 - Aim is to:
 - · Contribute to the discipline / art and science of red teaming
 - Evaluate the quality, utility, and impact of red teaming on blue
 - Define actual costs, resources, and timelines to do red teaming at the operational level

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Research Problem 4 – Evaluation

- Use academic and community-based experts to answer ...
 - "How do we evaluate the effectiveness and utility of red teaming?"
 - Are knowledge-transfer models applicable to the red teaming endeavour?

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'Traditional' Analytical Frameworks

- Operational environment (OE) has become increasingly complex
- Due to the move away from state-state conflict towards population-focused operations
 - Stability and Support Operations (SASO), of which counter-insurgency operations (COIN) is a sub-set
- Traditional analytical frameworks (models) have largely failed to provide the required insights, in particular at the sub-national level
 - They are designed to examine national elements of power
- PMESII (Political, Military, Economic, Social, Infrastructure, Informational)
- DIME (Diplomatic, Informational, Military, Economic)
- DIMEFIL (DIME + Financial, Intelligence, Law Enforcement)
- MIDLIFE (Military, Intelligence, Diplomatic, Law Enforcement, Informational, Finance, Economic)
- ASCOPE (Areas, Structures, Capabilities, Organizations, People, Events)

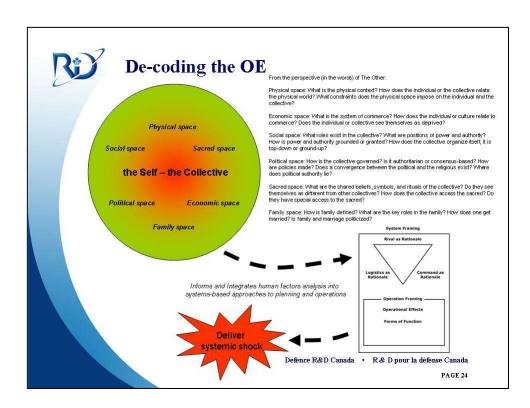
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Where do we go from here?

- None of the traditional frameworks are dedicated to de-coding socio-cultural factors, esp. at the sub-national / sub-cultural level
- Need to move towards a more ethnographic / red lens approach to understanding the OE
- It is not only about understanding physical and social structures of a particular, it is also about appreciating the relationship and the influences of these structures on the daily lives of the people in the OE, especially from The Other's perspective
- Inter-dependencies, inter-play and (what Shimon Naveh referred to as) tensions in social (complex) systems
 - Naveh that introduced this ethnographic understanding of the OE via Systemic Operational Design (SOD) ... what is often called Operational Art

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2.3.2 Question & Answer Session

Mr. Lauder's presentation on the Red Team Use-Case study and red teaming more generally sparked a great deal of interest among the workshop participants. A number of key themes emerged over the course of the discussion.

What is red teaming?

Although not directly addressed in the Q&A session, the broad scope of this activity came through in Mr. Lauder's responses to a number of questions and comments. He noted that, when we talk of red teaming, we automatically think in terms of the big 'R' enemy. However, red teaming should also be understood in the sense of "challenge". It is not necessarily about the enemy *per se*, but about the whole battlespace, of which the enemy is but one part. He remarked that military intelligence has traditionally been far too focused on Red and has not gone beyond that to understand and integrate Blue, White, Green and other perspectives in its analyses. Red teaming is an endeavour that supports the broadening of that focus.

Red teaming also extends to understanding the perspectives of other government agencies – e.g., DFAIT, CIDA and PCO – with which the CF cooperates in a whole-of-government approach. Mr. Lauder noted that what J3 (Operations) wants, for instance, is to model domestic government decisionmaking, so that they can anticipate what the demands of other government agencies on the CF might be, allowing them to get ahead of the curve with respect to the operational planning environment.

In Mr. Lauder's view, when there is no threat emulating, red teaming is all alternative analysis or red team analysis. He distinguished this from the red team game, which, he said, is slightly different. He described a Canadian red teaming example – the red teaming table-top exercise (TTX). The TTX is designed, executed and coordinated by the red team, with the red team leader serving as the leader for that exercise in a series of scenarios that are linked by an adversarial campaign plan, and with the red team walking the staff through these scenarios. The purpose of the TTX is to identify with the staff a particular end state or issue(s) so they can subsequently tackle them on their own. This, he said, was the main nuance between the TTX and normal red teaming exercises. The purpose and the end result of red team analysis and red team game are the same – to create awareness for Blue – but the approaches are different.

There is also a training dimension to red teaming – red teaming as a learning tool. Mr. Lauder reminded the group that red teaming – or, rather, a red cell – has been used in pre-deployment exercises for troops deploying to Afghanistan. He noted that returning troops had said that those exercises had been quite helpful in navigating that culturally complex society.

Where should red teaming be situated?

A recurring theme centred on where the red teaming activity – or the red team as a separate entity – is or should be located with the CF organization. Where does it fit in? For example, should it be housed in J2 (Intelligence), J3 (Operations), J5 (Plans) or even J9 (Civil-military relations)? One participant remarked that the 2-shop already does red teaming to a certain extent, e.g., in

wargaming. Likewise, Mr. Lauder noted that sometimes the red team is located in the 2-shop. From his experience in Afghanistan, it was situated at the divisional level, as part of the commander's special staff. Ultimately, he said, it is up to the commander where he or she puts the red team.

Relations with commanders

'Top cover' from the commander for the red teaming activity is essential. Mr. Lauder stressed that it must be explicitly sanctioned at the highest level possible within the organization or people will not buy into it.

Later in the session, he expanded on the relationship between the commander and the red team, describing it as a 'push-pull' relationship. The commander will flag an issue, e.g., force protection, that he wants the red team to examine or, more precisely, on which to provide an alternative perspective. The red team responds with a product and associated briefing on that issue. However, the red team is not strictly responsive. It will, on its own initiative, identify a number of key issues or problems of which the commander might not be aware and bring them to his or her attention. It is in that sense that the relationship can be described as 'push-pull'.

Operating a red team

Who are the red teamers? Are they uniformed military, civilian academics, or a combination? Mr. Lauder observed that red teams are recruiting better, more qualified individuals, though there is an issue with civilian red teamers – that is, academics – who are not used to working in high-risk environments.

Mr. Lauder remarked that a red team consisting of charismatic and dynamic individuals – a good team leader, and supportive and qualified team members – can do some very good things. Red teaming, however, is a sensitive activity, involving, as it does, challenging people's perspectives, which is seldom welcome. He had seen some red teams "crash and burn". Their approach was not to challenge but to condemn. One team of which he was aware had literally come in the day before an operation and said, "Your plan is flawed, you're going to have to revisit it". That was not very helpful, he said; at that point, it was too late.

Mr. Lauder agreed with a participant's comment that red teaming was not a "silver bullet". Some see it as such, especially those people who have not been exposed to red teaming before, have not been trained in it, or have not used it. But it is not the "knock-out punch". The success rate will never be 100 percent. Red teaming is only as good as the team's staff and the relationship the team can develop and build with Blue.

Deconfliction, competition and collaboration

This theme ties in with the red team's working relationship with other elements of the CF, in particular, with J2 (Intelligence). One participant wondered whether there does not have to be some sort of deconfliction and coordination with the 2-shop. Mr. Lauder thought this was so and cited two examples. With respect to the Vancouver 2010 Winter Olympics, the red team worked closely with the 2-shop for the purpose of deconfliction, exchanging information and perspectives, etc. The red team had a good working relationship with the 2-shop: it was not that

the red team was *responsive* to the 2-shop, but, rather, that the red team and the 2-shop developed *a mutually supportive relationship*. This was also his experience in Afghanistan, where the red team in RC [Regional Command] East worked closely with the 2-shop. Quite often, the 2-shop came to the red team for an alternative perspective on the problem space.

Mr. Lauder stressed that the red team cannot become a competitor to the 2-shop; if it does, the whole thing falls apart. Rather, the red team must collaborate with the 2. Red teaming is a *support* activity, not a *competitive* activity. Its value lies in having a solely dedicated 'outside the box'-thinking entity that is, nonetheless, integrated or fused with other agencies, as is the case in the Kandahar Intelligence Fusion Centre.

The way ahead

What lies ahead for red teaming? One participant noted that, thus far, red teaming is very personality driven, but that it needs to be institutionalized so that tangible things can be created that will actually be of use to our soldiers on the ground. Others wondered what the end state of Mr. Lauder's red teaming study was? Is it to generate knowledge of red teaming and how to apply it in a Canadian context, or is it to build a red team? If the latter, that is, to create a red team that functions in an exercise environment, then there are a number of "plumbing" issues that will have to be resolved, e.g., security clearances for red teamers, etc.

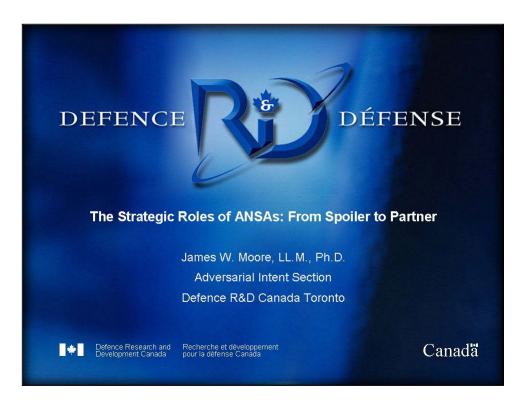
Mr. Lauder observed that red teaming is still in its early stages, but that there has been progress. It is starting to standardize, and some lessons learned are starting to get out. As well, information is starting to be shared. Red teaming has become more accepted. Commanders across the board are mostly positive. NATO has embraced red teaming, and has created a working group which is setting up the terms of reference for future development of this activity.

As for the red teaming study itself, he noted that it wraps up in March 2011. It is currently at the "bootstrapping" stage, identifying all the key issues for further detailed investigation. This study, however, is not about capability development but about developing the preliminary knowledge base as a foundation for future research. When this study ends, someone else in DRDC will take this on and become the red teaming champion, and will put together a Technology Development Project (TDP), which will actually be about capability development. This study sets the stage for more detailed work to follow.

There is much that remains to be done. In two years time, he said, we are not going to have five or six people planted in a space doing human domain analysis [including red teaming]. It will take longer than that, because issues of data collection methods and techniques as well as organizational 'fit' must be critically examined. As Mr. Lauder concluded, this all takes time.

2.4 Session Four – The Strategic Roles of ANSAs: From Spoiler to Partner (J. Moore)

2.4.1 Presentation



Introduction

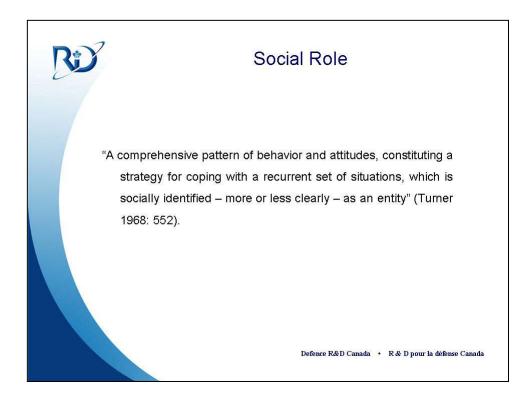
In this presentation, I'd like to share with you some of my initial thoughts on the first of the two research objectives of this Project that I mentioned in my introductory remarks, specifically, the strategic roles of ANSAs in the context of violent intergroup conflict. In this Project, we're interested in exploring the following general questions, among others: What are the social roles of ANSAs? What factors influence their choice of roles? And under what circumstances will an ANSA move from the role of spoiler to that of partner in conflict management and resolution processes?

I'll begin with an overview of **social roles** and **identity**, taking primarily a sociological/social psychological approach, one based on the assumption that we, in our day-to-day lives, act out multiple roles with which are associated sets of expectations, norms and behaviours. We'll follow this with a discussion of the possible roles an ANSA may perform at the grand strategic, strategic and operational levels, as well as the generic strategies that may be pursued in the course of

enacting these roles. Finally, I'll offer some final thoughts on the importance of these questions for the CF's conduct of current and future expeditionary operations.

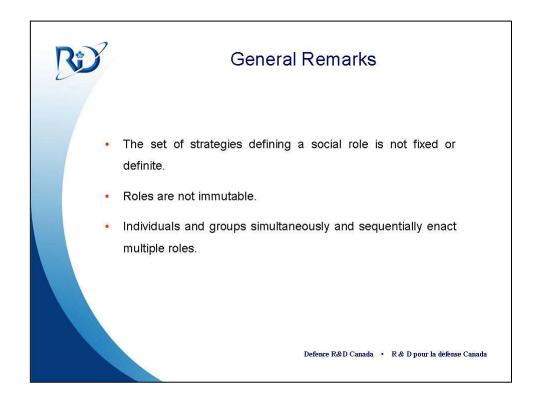
Roles and Identities

The approach taken here builds upon the intimate link between **role** and **identity** long recognized in the human sciences. Ralph Turner, Professor Emeritus in UCLA's Department of Sociology, defines **social role** as set out here:



His is an inclusive definition stressing the *gestalt* character of social roles (Turner 1990: 88, fn.1), that is, **role** as a perceptual pattern, structure or configuration forming and functioning as a coherent, identifiable whole or unity greater than the mere sum of its parts. Roles should be distinguished from **positions**. **Positions** (or **statuses**) are the relatively stable structural elements of organized social units – such as groups, organizations, etc. – with which more or less regularized and distinctive activities, functions, duties, rights and privileges are associated (Holsti 1970: 241-242). Roles, then, are *the dynamic aspect of positions*, "their associated rights and duties *in action* [emphasis added]" (Stryker 2002: 218). The difference between the two can be summed up as follows: an individual or group *occupies* a position but *enacts* or *performs* a role (Turner 1956: 317).

Some general remarks on roles:

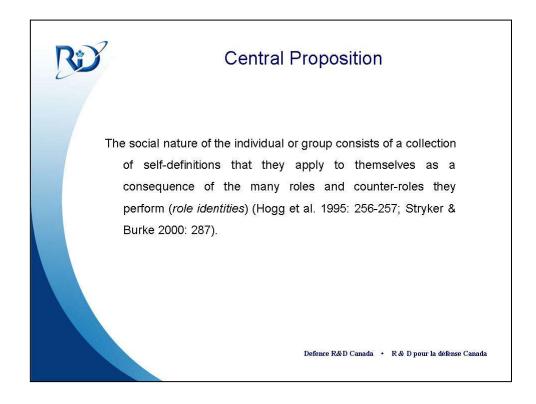


First, the set of strategies defining a social role is not fixed or definite; in other words, roles are fuzzy. The role performer has available a suite or repertoire of strategies to draw upon, the particular mix reflecting what the actor deems appropriate given the circumstances. Thus, a given role, though generally distinguishable as such, may differ in its specifics among individuals and groups and across circumstances.

Relatedly, roles are not immutable or unchanging over time; they are not carved in stone. They are dynamically and creatively constructed and reconstructed through the interaction of their occupants with individuals situated in other connected roles and counter-roles (Hogg et al. 1995: 265).

Most importantly, individuals and groups simultaneously and sequentially enact multiple roles. Sometimes, this leads to **role competition** or **role conflict**, when actions taken to fulfill the expectations associated with one role conflict with those necessary to satisfy another. This can result in cognitive discord and, in the extreme, behavioural paralysis. On the other hand, as Lynch points out, individuals generally are able to cope with role overlap, role shuffling and role switching as common facets of social life, without becoming incapacitated (Lynch 2007: 380).

It's from these multiple roles that individuals derive their **identity** or, rather, identities. This leads us to our central proposition:



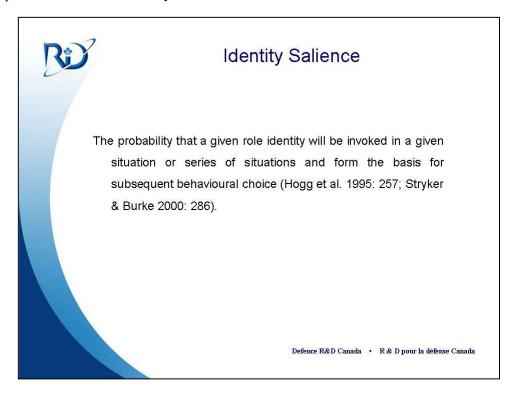
These **role identities** provide the individual and, collectively, the group with self-meaning, answering the question "who am I?", in three ways:

- Through the distinctive and distinguishing rights, duties, privileges and tasks attached to the structural role positions which they occupy;
- Through the differentiation of the roles they enact from relevant counter-roles, for example, the role of 'parent' has no meaning apart from the counter-role of 'child'; and finally,
- Through others' responses to one's roles, that is, the positive and negative cues others
 provide on the individual's or group's role performance over the course of ongoing social
 interaction.

The key in all this is the multifaceted nature of the individual or group self-concept emerging from the many and varied roles played in society. Indeed, an actor has "as many identities as distinct sets of social relations in which they occupy a position and play a role" (Stryker 2002: 227). These role identities are especially important in understanding the motivations of ANSAs. These internalized meanings and expectations are generally shared among members of a group, though not necessarily rigidly or unanimously in all respects. Indeed, they may be actively contested among the group's members, its cliques and factions, and in the extreme may lead to the break-up of the group. Nor are these role identities always logical or internally consistent, being the kaleidoscopic products of history, memory and socialization. Importantly, not all roles are equally available to a group. Role identities define the group's feasible set of social roles. In this respect, they're both *prescriptive* and *proscriptive*: they affect what roles a group believes it

can and cannot enact. They also influence the process and style of performance of the group's self-defined roles (Krotz 2002: 8-9).

These role identities are not, however, just a confused hodge-podge. Rather, they're arranged relative to each other in a hierarchical structure based on some ordering principle. The organizing principle assumed here is **identity salience**:



In other words, identity salience refers to the transsituational relevance or applicability of a given role identity.

Three general points should be noted concerning the salience hierarchy:

- The more likely a particular role identity will carry across situations that is, the more salient the role identity the higher it appears in the hierarchy;
- The individual's or group's salience hierarchy is assumed to be relatively stable (Hogg et al. 1995: 265; Stryker & Burke 2000: 286), thereby lending a degree of predictability to behavioural choices; and finally,
- Two or more role identities may be located at the same rank within the hierarchy (Stryker & Serpe 1994: 17, fn.1). This can confront the individual or group with a dilemma, especially when role identities of equivalent saliency recommend conflicting courses of action.

The key point to take from all this is that different roles can be salient for different individuals and groups at different times and in different circumstances. The question for our Project, then,

becomes: when or under what conditions does one role or mix of roles become more prominent than others for an ANSA? In particular, under what circumstances will an ANSA adopt – or renounce – roles characterized by resort to collective political violence?

To sum up, then, in order to better understand an ANSA, we must be cognizant of its role identities, that is, its perception of itself and the roles it plays within society. In many instances, the goals and norms self-associated with these roles may be at variance with the values and expectations of society at large, most often with respect to the use of violence to achieve political ends. Thus, in the performance of its various roles, the ANSA must additionally work to overcome this delegitimizing "shadow of violence" (Schlichte 2009) and persuade other actors of the legitimacy of its role-related goals (at a minimum), if not necessarily of its strategies or methods. Indeed, this is one of challenges ANSAs face in the competition for legitimacy in which it engages with the established authorities and their allies as well as other competing non-state actors.

Instigators and Perpetrators

To this point, we've been discussing the concept of social role in general theoretical terms. What are some of the practical roles which ANSAs actually perform? One of our colleagues in Adversarial Intent, David Mandel, contributed a chapter to a recently published comprehensive and multidisciplinary collection of papers on global terrorism (Mandel 2010), for which Laurie Fenstermacher was the chief editor. In it, he distinguished two such roles, **instigators** and **perpetrators** of political violence:



Though in some instances there may be overlap between these roles, more often there's a division of labour among individuals, especially as the size and complexity of the group increases, with different group members performing these two different roles.

Though David focuses on role differentiation among individuals within the group, we frequently see the same division of labour replicated in ANSAs at the group level. Often ANSAs are, ostensibly at least, divided into an armed wing that carries out paramilitary activities (the perpetrators) and a civilian wing that focuses on political mobilization (the instigators). The roles of the IRA and Sinn Fein in the Irish republican movement represent a classic example of this division of labour. Sometimes, however, this division of labour is more apparent than real. For example, the senior political leaders of Sinn Fein – Gerry Adams, Martin McGuinness and Martin Ferris – are suspected of being members of the controlling seven-member Army Council of the paramilitary IRA (McKittrick 2005).

Note that not all partitions into militant and political wings reflect a deliberate division of labour on the part of the ANSA. Often, the split reflects fundamental disagreements within the group over the efficacy of violent vs. non-violent strategies in achieving its shared political aims, with little subsequent communication or control between the mutually hostile factions.

Strategic Roles of ANSAs

Of course, these roles of instigators and perpetrators of collective political violence are not the only ones ANSAs adopt. Other operational roles include community defender (or coercer), service provider, resource collector (or extortioner), judicial arbiter, among others. Moreover, ANSAs may enact roles at the higher strategic and grand strategic levels.

Before we examine these latter roles in more detail, we should first clarify what we mean when we refer to the **grand strategic**, **strategic** and **operational** levels of activity. The following definitions are adapted principally from the "level of war" definitions found in the DoD Dictionary of Military and Associated Terms (JP 1-02), and from other sources; they've been generalized beyond the exclusive military focus of these source definitions (see Slide, next page):



Levels of Activity

- Grand strategic level. The level of activity at which a state or non-state actor:
 - Determines national or group policy (ends).
 - Develops, employs and coordinates (ways) all the military and non-military instruments of power (DIME) available to the actor (means), to achieve a desired end-state as set down in policy.
- Strategic level. The level of activity at which a state or non-state actor:
 - Determines national or group DIME-specific guidance and objectives (ends).
 - Develops, employs and coordinates (ways) the characteristic elements of power (means) to achieve these objectives.
- Operational level. The level of activity at which a state or non-state actor:
 - Plans, conducts and sustains campaigns and major operations to achieve strategic objectives.

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The **grand strategic level** is that level of activity at which a state or non-state actor:

- Determines national or group policy (ends), the latter defined as "a broad course of action or statements of guidance adopted by an actor in pursuit of national [or group] objectives" (Lykke 1989: online p.1); and,
- Develops, employs and coordinates (ways) all the military and non-military instruments of power diplomatic/political, informational, military and economic (DIME) available to the actor (means), to achieve a desired end-state as set down in policy.

(Related definitions of grand strategy found in Lykke 1989, Kennedy 1991, and Gray 2007 have also shaped the definition of the grand strategic level presented here. For a discussion of the DIME instruments of power, see the chapters in "Section III Elements of Power", in Bartholomees 2006.)

The **strategic level** is that level of activity at which a state or non-state actor:

- Determines national or group DIME-specific guidance and objectives (ends), that is, the specific missions or tasks to which efforts and resources are applied (derived from Lykke 1989: online p.2); and,
- Develops, employs and coordinates (ways) the characteristic elements of power (means) to achieve these objectives. Activities at this level include developing plans to achieve set objectives; sequencing initiatives; defining limits and assessing risks for

the use of DIME-specific elements of power; and providing requisite capabilities in accordance with strategic plans.

Finally, the **operational level** is that level of activity at which a state or non-state actor:

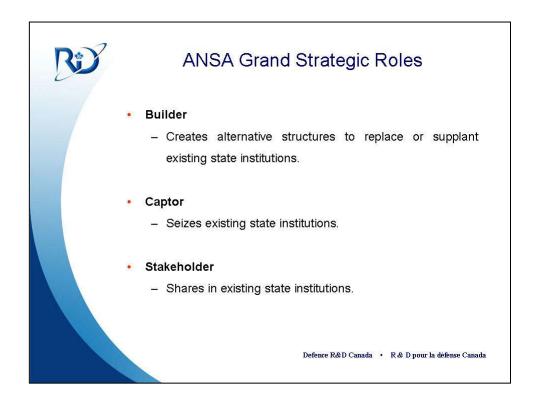
• Plans, conducts and sustains campaigns and major operations to achieve strategic objectives. Activities at this level include establishing operational objectives (ends) needed to achieve the strategic objectives; sequencing and initiating events and actions (ways) to achieve the operational objectives; and applying resources (means) to bring about and sustain these events.

Underlying all three levels of activity is the general strategic equation that reads **strategy = ends** + **ways + means**. As retired Col. Art Lykke, a strategic theorist on the faculty of the US Army War College, noted, this general strategic paradigm is applicable to all levels of war – or purposeful activity more broadly – and "can be used as the basis for the formulation of any type of strategy – military, political, economic and so forth, depending upon the element of national power employed" (Lykke 1989: online p.1). Thus, we may speak of *political/diplomatic*, *informational*, *military* and *economic* strategies, and, at the operational level, of *political/diplomatic*, *informational*, *military* and *economic* campaigns and operations.

Ideally, activities at these three levels are coherent and reinforcing: operations in a given domain support the achievement of strategic objectives in that domain, which, in combination with actions in other fields of activity, contribute to the attainment of national or group policy objectives. Reality, however, is seldom so rationally ordered. Lykke observes that "[s]ometimes policy guidance is difficult to find, unclear or ambiguous [or, in many instances, non-existent]...[and] national policies in these fields are often overlapping and may even be contradictory" (Ibid.: online p.2). Such messy overlap also surfaces at the strategic level, where there are seldom "purely military" or "purely political" objectives (Ibid.). Moreover, leaders, whether of states or of ANSAs, may not always adopt the proper instrument of power with which to pursue their policy goals, even if those goals are consistent and explicit. For example, they might choose to use the military tool to pursue policy objectives that are largely political or economic in nature. This can complicate matters for military commanders as they try to derive feasible military objectives from the objectives of national policy (Ibid.).

Grand Strategic and Strategic Roles

Having clarified the three levels of activity, let us consider the roles ANSAs may potentially adopt at the grand strategic and strategic levels. First, a qualifying note. The following should be seen as archetypal roles. Not every ANSA performs these roles at all times and in all circumstances, nor do they perform them in precisely the same way. Many ANSAs may lack a clear and coherent grand strategic or even strategic vision, "making it up" as they go along, groping their way towards a nebulous political end-state.



At the grand strategic level, an ANSA may perform the role of:

- State builder in which it seeks to sweep aside the institutional structure of the *ancien régime* and replace it with new structures. This is most often associated with social and political revolution, as in the case of the Chinese Civil War in which Mao's Communist party swept the ruling Kuomintang government from the mainland and imposed a radical communist system on Chinese society.
- **State captor** in which the ANSA seeks to take control of existing state structures and institutions, in other words, to preserve the structures but replace the incumbents. This is most often associated with a *coup d'état*; or,
- State stakeholder in which the ANSA is willing to share in existing state structures and institutions, that is, to accept a parceling out of the power centres in the existing governance structures among the major players in a conflict. This is most often associated with power-sharing arrangements, such as the Good Friday Agreement that divided up the ministries of the interim administration in Northern Ireland between Sinn Fein and the Protestant parties.

Strategic Roles – Spoilers and Partners

What are the roles that ANSAs play at the strategic level? The seminal article on this appeared in the journal *International Security* in 1997, Stephan Stedman's "Spoiler problems in peace processes". In it, he defines a **spoiler** as:



The precondition for a spoiler role, he argues, is the existence of a peace process, which is said to exist once "at least two warring parties have committed themselves publicly to a pact or have signed a comprehensive peace agreement" (Stedman 1997: 7). I would argue that this is an overly narrow view of what constitutes a "peace process". Stedman essentially restricts this to the implementation phase of a formal and public peace agreement, the outcome of official "track I" diplomacy. Understood more broadly, **peace process** encompasses the long and often tortuous series of negotiations, dialogue and other conflict resolution processes that, if successful, culminate in a comprehensive agreement (Ricigliano 2005: 98-99). An ANSA can assume the role of spoiler at any point in the process, not only once a formal peace agreement is in place. For example, on 18 January 2010, the Taliban launched a coordinated series of attacks in the Afghan capital, declaring afterward that this action was taken in order to abort President Karzai's call for a national reconciliation process and to demonstrate that the Taliban was "not for sale" to his government and its foreign allies (Filkens 2010).

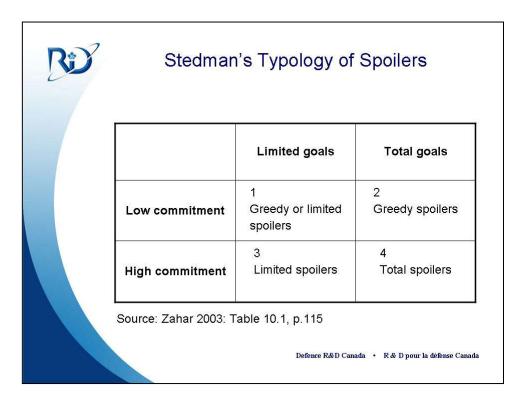
Stedman differentiates spoilers along two dimensions: (1) their relation to the peace process, and (2) their type. In terms of the first dimension, a spoiler may be outside or inside the peace process. An **outside spoiler** operates outside the process and stands in implacable, often violent, opposition to it. It strives for maximalist goals, that is, to dominate the political structures of the

state. An **inside spoiler**, on the other hand, operates inside the peace process, formally committing to a peace accord and its implementation, while at the same time duplicitously reneging on its obligations under that accord. Inside spoilers tend to minimize violence so as not to completely destroy their credibility as a partner in peace and to consequently lose the advantages over its adversaries to be surreptiously derived from continued participation in the process (Stedman 1997: 8). In other words, they follow a course of deliberate strategic deception (Stedman 2003), acting as a trojan horse, if you will, in the process. Many commentators have argued that PLO Chairman Yasir Arafat was just such an inside spoiler, publicly maintaining his commitment to the Oslo Accords while refusing to fulfill his obligations under those agreements to fight terror, and, indeed, encouraging terrorist violence against Israel behind the scenes, particularly during the second Intifada.

As for the second dimension, Stedman distinguishes the types of spoilers based upon their goals – whether total or limited political power – in combination with the strength of their commitment to the pursuit of those goals – whether high (that is, *unalterably dedicated* to achieving its power ambitions) or low (that is, *pragmatically attached* to the pursuit of these ambitions). On this basis, he identifies three types of spoilers:

- A total spoiler seeks exclusive or, at least, dominant political power, a goal to which it is highly or irrevocably committed. This links back to the grand strategic-level roles of State Builder or State Captor. In counterinsurgency doctrine, such actors are generally labelled "irreconcilables". It is assumed that the only strategy for dealing with such actors is to marginalize and isolate them from society, and, ultimately, to physically eliminate them ("kill or capture").
- A **limited spoiler** *pursues more limited goals, and is willing to share power or to accept the constitutionally-constrained exercise of power.* This links back to the grand strategic-level role of State Stakeholder. Limited goals, however, do not necessarily imply low or weak commitment. As Stedman notes, a limited spoiler may be highly or firmly committed to these goals, and willing to endure much sacrifice in order to achieve them (Stedman 1997: 10).
- A **greedy spoiler** may pursue either total or limited goals, the difference being that these goals expand or contract depending on the spoiler's ongoing cost/risk assessment (Ibid.: 11). In other words, its commitment to these goals is low. Put differently, the greedy spoiler can be characterized as an *opportunistic* spoiler, whereas the previous two are *principled* spoilers.

These spoiler types can be located within a two-dimensional – goals and commitment – matrix:



Although a definite advance in our understanding of the strategic roles ANSAs can play within a peace process, there is one major problem with Stedman's typology: its one-sidedness. It focuses only on those strategic roles that stand *in opposition* to the peace process. What it lacks is the opposite to spoiler.

We start from the premise that ANSAs – hard as it may seem when they are shooting at us – may also be active participants in the conflict resolution process. Recall Margaret Thatcher's comments at the 1987 Vancouver Commonwealth Summit. At a press conference on October 17th, she told reporters:

"I will have nothing to do with any organisation that practices violence. I have never seen anyone from ANC or the PLO or the IRA and would not do so. Nor will we have any truck with any of the organisations; we never negotiate with hostage taking or anything like that" (Thatcher 1987).

In the event, all three organizations became participants in their respective peace processes (with varying degrees of success). The point here is that ANSAs are not always or exclusively roadblocks to peace. In some circumstances, they may actually be the key to resolving social conflict. At the very least, we – as social scientists – must recognize the conflict resolution role that ANSAs potentially may play, and not *a priori* restrict our analytical horizons to their disruptive behaviours only.

What this suggests is that we need an expanded classification scheme, a general dichotomous typology that explicitly includes the binary opposite to spoiler, what I would term a **partner**. A partner is one that pursues limited political ambitions and is willing to share political power with

other actors, linking back to the State Stakeholder at the grand strategic-level. A partner's commitment to these limited ambitions, which it pursues exclusively from inside the peace process, may be unalterable or pragmatic – high or low in Stedman's typology. But what distinguishes the partner from the spoiler is that a spoiler has no sincere commitment to a peaceful resolution of the conflict, while a partner's commitment is genuine.

As with spoiler, there are variants within this broad category of partner. Two spring immediately to mind: the **unconditional partner**, and the **contingent partner**:



The first is a party whose devotion to the ultimate success of the peace process is unwavering despite the inevitable bumps encountered along the way to a settlement. Put differently, an unconditional partner reposes sufficient trust and confidence in the process and in the other participants to remain engaged regardless of temporary setbacks. A **contingent partner**, on the other hand, while committed to the ultimate success of the process, conditions its actions on the prior or, at a minimum, simultaneous fulfillment of the other parties' obligations. It doesn't have the same degree of trust and confidence in the process and the other participants as does the unconditional partner. For them, confidence-building measures are essential in order to lessen suspicion and mistrust of the other parties' intentions (for a overview of CBMs, see Maiese 2003). This is especially true when it comes to measures of disarmament and demobilization, when the ANSA is faced with the fundamental transition from an *armed* to an *unarmed* non-state actor.

Incorporating the category of partner allows us to greatly expand the typology of ANSA roles at the strategic level. Stedman's typology identified 10 strategic roles – the 5 spoiler types, each of which can be outside or inside the peace process. In our comprehensive typology, we have a total

of 20 possible strategic roles – 3 types at the grand strategic level (Builder, Captor and Stakeholder), Stedman's 5 spoiler types, and our 2 partner types, factoring in their position as either outside or inside the peace process:

	Comprehensive Typology				
Type of ANSA (Goals/ Commitment to Goals)	Grand Strategic Role	Relation to the Peace Process			
		Outside	Inside		
1. Total (Total/High)	Builder	1.1 Spoiler	1.2 Spoiler		
	Captor	1.3 Spoiler	1.4 Spoiler		
2. Limited (Limited/High)	Stakeholder	2.1 Spoiler	2.2 Spoiler		
			2.3 Contingent Partner		
			2.4 Unconditional Partner		
3. Limited (Limited/Low)	Stakeholder	3.1 Spoiler	3.2 Spoiler		
700	3		3.3 Contingent Partner		
			3.4 Unconditional Partner		
4. Greedy (Total/Low)	Builder	4.1 Spoiler	4.2 Spoiler		
	Captor	4.3 Spoiler	4.4 Spoiler		
5. Greedy (Limited/Low)	Stakeholder	5.1 Spoiler	5.2 Spoiler		
			5.3 Contingent Partner		
			5.4 Unconditional Partner		

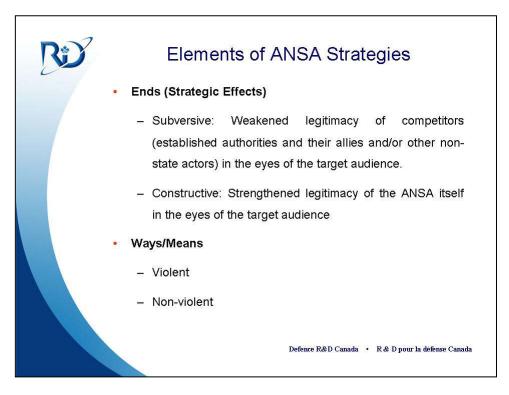
I'd like to briefly consider one example, our Type 5.1 Stakeholder/Greedy Outside Spoiler (highlighted in yellow). An ANSA in this role is willing to share power with other stakeholders, and is pragmatically committed to the pursuit of limited power within a constitutionally-constrained political framework. And yet, as an Outside Spoiler, it holds itself aloof from the peace process and, indeed, acts so as to undermine that process. On the one hand, it's willing to ultimately accept political compromise, yet, on the other, it seeks to sabotage the process whereby such compromise is reached. Isn't this a contradiction?

I would argue that such a seemingly contradictory strategic role is, in fact, entirely possible. Essentially, what it means is that an ANSA playing this role is opposed, for whatever reason, to the peace process *in its current configuration*. It may be willing in the end to compromise and to share power, but it doesn't believe that an acceptable compromise is possible in the conflict resolution process as currently constituted. For example, there may be elements within the Taliban that are willing to engage in a reconciliation process with the Kabul government, but not so long as, in their view, foreign forces are "occupying" Afghanistan and are thought to be manipulating the government and the process from behind the scenes (Gall 2011).

Strategies

Recall from our earlier definition that a social role is essentially a repertoire of behavioural patterns or strategies that are generally thought to attach themselves to a specific position. Is it

possible to identify, at least in generic terms, a dominant strategy that characterizes each of the strategic roles set out in our typology?



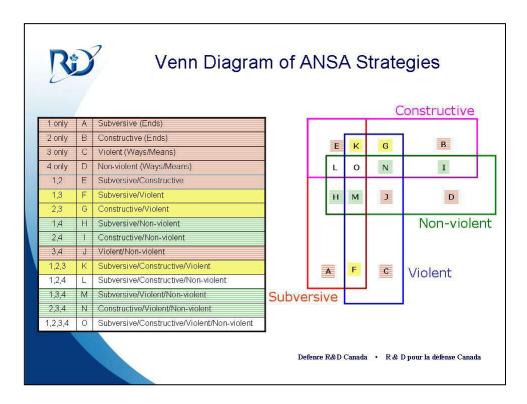
We can tackle this question on the basis of the classic strategic paradigm mentioned earlier: strategy = ends + ways + means. In terms of ends, strategies may be:

- **Subversive**, where the objective is to undermine the legitimacy of competitors, whether the established authorities and their allies and/or other non-state actors, in the eyes of the target audience; or
- **Constructive**, where the goal is to reinforce the ANSA's own legitimacy in the eyes of its audience.

Combining ways and means, strategies may be generally distinguished as **violent** or **non-violent**.

These strategic elements are not mutually exclusive. An ANSA could pursue a strategy mix that aims to achieve both subversive and constructive strategic effects at the same time, using both violent and non-violent means and methods in the process.

Rather than representing these strategic elements in a two-by-two matrix, then, the range of possible combinations of elements is better captured in terms of a Venn Diagram:



As we can see, there are 15 possible permutations. Of course, not all of them are feasible. We can pare away some of these permutations by simply assuming that, for a strategy to be complete, it must be made up of both elements – ends and ways/means. On this basis, we can eliminate six combinations that lack one or other of the elements (these are the permutations with the red horizontal strike-throughs). This leaves nine remaining strategies.

As the basis for our second cut, we assume that no ANSA focuses solely on strategies of violence. In reality, violent strategies are pursued in conjunction with and, if the ANSA knows its business, in a manner reinforcing other non-violent strategies such as subversion, information operations, alternative service provision and the like. Thus, of the nine remaining strategies, we can eliminate those in which the ways/means are exclusively violent (the three permutations with the yellow diagonal strike-throughs), thus leaving six feasible strategies.

As a third and final cut, we assume that ANSAs pursue mixed-ends strategies, that is, they aim to achieve both subversive and constructive strategic effects simultaneously. In simple terms, they want to make their opponents look bad and make themselves look good in the eyes of the target audience, in order to shift the competition of legitimacy decisively in their favour. On this basis, we can eliminate another four single-end strategies (the green horizontal strike-throughs), leaving us with two feasible strategies: L – Subversive/Constructive/Non-violent, and O – Subversive/Constructive/Violent/Non-violent.

Can we associate these strategies with particular strategic roles from our typology? To do this, we make the simple assumption that an Unconditional Partner renounces violence and pursues mixed-ends but exclusively non-violent strategies (Strategy L), whereas Spoilers and Contingent Partners pursue mixed-ends *and* mixed violent/non-violent strategies (Strategy O). The resulting role-strategy pairings are presented here:

	Type of ANSA (Goals/ Commitment to Goals)	Grand Strategic Role	Relation to the Peace Process			
			Outside		Inside	
			Strategic Role	Dominant Strategy	Strategic Role	Dominant Strategy
	1. Total (Total/High)	Builder	1.1 Spoiler	0 (1 & 3)	1.2 Spoiler	0 (1 & 3)
		Captor	1.3 Spoiler	0 (1 & 3)	1.4 Spoiler	0 (1 & 3)
	2. Limited (Limited/High)	Stakeholder	2.1Spoiler	0 (1 & 3)	2.2 Spoiler	0 (1 & 4)
					2.3 Contingent Partner	0 (2 & 4)
					2.4 Unconditional Partner	L (2)
	3. Limited (Limited/Low)	Stakeholder	3.1 Spoiler	0 (1 & 3)	3.2 Spoiler	0 (1 & 4)
	4. Greedy (Total/Low) 5. Greedy (Limited/Low)				3.3 Contingent Partner	0 (2 & 4)
					3.4 Unconditional Partner	L (2)
		Builder	4.1 Spoiler	0 (1 & 3)	4.2 Spoiler	0 (1 & 4)
		Captor	4.3 Spoiler	0 (1 & 3)	4.4 Spoiler	0 (1 & 4)
		Stakeholder	5.1 Spoiler	0 (1 & 3)	5.2 Spoiler	0 (1 & 4)
					5.3 Contingent Partner	0 (2 & 4)

Where the role types differ is in the relative emphasis placed on the elements within the dominant strategy associated with each role. For example, our Type 1.1 Builder/Total Outside Spoiler (highlighted in yellow) pursues a mixed strategy designed mainly to achieve a subversive strategic effect – that is, to delegitimize the opponent – using primarily violent means to do so: Strategy O with a (1 & 3) emphasis (ref. Venn Diagram). Alternatively, the Type 2.3 Stakeholder/Limited Contingent Partner (highlighted in green) also follows the same dominant Strategy O as Type 1.1, but with a significantly different mix in terms of its elements; it seeks mainly constructive ends – building up its own legitimacy – through primarily non-violent means: Strategy O with a (2 & 4) emphasis. This doesn't mean that the Contingent Partner rejects violence in any or all circumstances, nor that it will refrain from trying to make its opponents look bad. Only that these latter elements of mixed Strategy O do not assume the same prominence in the strategy of the Type 2.3 Contingent Partner as they do for the Type 1.1 Outside Spoiler. (I hasten to add that these and the other role-strategy pairings presented in the Table are only hypothesized associations. Obviously, these need to be verified empirically.)

Why Does It Matter?

To sum up, I've offered one take on a comprehensive typology of strategic roles that ANSAs can play in relation to the conflict resolution processes through which solutions to violent intergroup

conflict are sought, and speculated as to the dominant strategies that characterize these strategic roles. But we've yet to address the "so what" factor. The preceding may make for an mildly interesting talk at a defence S&T workshop, but does it really matter?

It's my hope and belief that our efforts in this Project will push the boundaries of our understanding about ANSAs and their cognitions, affects and behaviours, an evolution in our thinking that is continuing and critical. In its earliest post-9/11 iterations, Western counterinsurgency doctrine took a narrow view of ANSAs, focusing almost exclusively on two strategic role types, that is, the Type 1.1 or 1.3 Total Outside Spoiler. These were the "pockets of dead-enders" as then US Secretary of Defense Donald Rumsfeld referred to the insurgents in Iraq in 2003 (Kelly 2003). In later iterations, under the guidance of Gen. David Petraeus and his team, US counterinsurgency strategy became more nuanced: rather than tarring all non-state actors with the "irreconcilable" brush of earlier years, these iterations recognized that some ANSA members were, in fact, "reconcilable", or, in our terms, potential partners. But even this recognition, though marking a tremendous stride forward, doesn't go far enough. We must broaden and deepen our appreciation of the many and varied strategic roles ANSAs can play and, equally as important, the circumstances in which such groups transition – or in which we can influence their transition – from one strategic role to another. Consideration of the broad socio-cultural and organizational conditions that can help or hinder such transitions will be the focus of the next two sessions in this workshop.



2.4.2 Question and Answer Session

The Q&A session explored further the concepts of 'state' and 'non-state actor'. The discussion began with a question as to the definition of 'state'. As one participant observed, this is key in the wording of 'non-state' actors and the sociology behind them. Spoilers can be seen to be state builders, for example, if one has a broader definition of 'state'.

Dr. Moore explained that the starting point for his understanding of this term is the Weberian concept of 'state', that is, the state as a social entity that has a monopoly on the legitimate use of violence within a defined territory. However, he distinguished between the state as an amalgam of power institutions – whether in a Western state structure, traditional tribal structure, etc. – associated with a particular territory, and the group(s) that control those institutions. The state itself is an object in the sense that it is the prize for which various social groups are competing. Those groups able to seize control of these power institutions call themselves 'the state' and seek recognition from other states – or, more precisely, the governments of other states. Sometimes, though, the notion that these groups constitute a state is nothing more than a polite fiction. Consider, for example, the Somali Transitional Federal Government, It desperately clings to a couple blocks surrounding the Villa Somalia presidential palace in Mogadishu, besieged by the Islamist ANSA, al-Shabaab. Is the TFG a 'state'? In reality, it is just another actor in the conflict situation that engulfs south-central Somalia. As a shorthand, we refer to those groups who control the power institutions generally associated or identified with the state as being themselves 'the state' when, to be precise, they are 'state actors'. 'Non-state actor', then, refers to those groups that do not control these particular institutions at a given point in time.

In response, the participant noted that Weber has a legal and rational definition of the state, but if one were to take, say, a medieval perspective, this would be a different way of looking at the state. It might be a useful way of thinking about the state.

Another participant remarked that civil society is the sum of voices not controlled by the state, so it is conceivable that some of these are non-state actors. As he understood the Project's research problem, it is, in part, how to take non-state actors that are potentially violent to the state and convert them to legitimate civil society actors that stabilize the state rather than undermine it from within. He wondered whether he was correct in assuming that this was the direction of the research.

Dr. Moore agreed that this was the value judgment underlying the research, that violence is not the method to achieve social change, at least in his personal opinion. He was quick to add, however, that the assumption is not that there should be no change, or that the status quo should be preserved. Societies have to evolve, they have to respond to change for their people. Therefore, change is an ongoing process. The question is what is the best method to achieve change? From his reading of historical and contemporary affairs, his judgment on this issue is that violence has seldom proved the best way to achieve positive long-lasting social change. Based on that fundamental assumption, the question becomes how can you redirect those social actors who resort to violence as a method to achieve their political ends into a framework that allows them the opportunity to non-violently pursue their goals? It is not enough just to draw them into a process in order to marginalize and control them. It has to be a framework that genuinely allows them to pursue their ends without violence, which in many instances requires a fundamental

change in the political institutions and framework of a society. But, he reiterated, this is a personal judgment, that there has to be a better way than violence.

Following up on this, understanding that the state is on one side and civil society on the other, the participant asked whether ANSAs fit in between the two? Is this the framework for the Project's research?

Dr. Moore admitted that he would have to give that framing more thought. He was unsure whether the dichotomy of state and civil society is necessarily one with which he agreed. States are not alien entities imposed on civil society. They might not be responsive to civil society, but, nevertheless, they are an integral part of the social fabric. That being the case, if there is not a sharp dichotomy, he was not sure that the position of ANSAs was one of 'standing in between' the two. Society is a "messy thing" and ANSAs are part of that complex mix, as are governments and other actors in civil society. It is all a nebulous cloud. It is very difficult to define boundaries between them. We try to separate and define constructs and concepts in order to help us understand what is going on. But we know how complex the realities and interactions are. In reality, you cannot easily separate these entities one from the other.

Another participant sympathized with this characterization of the situation. When referring to states, he continued, we have to be careful of the kind of society we are talking about. In many third world countries, for example, ANSAs are mixed with the state itself and mixed in society, and the state is basically acting on behalf of a large non-state actor or group belonging to the state. The lines or borders between states and civil societies, tribal groups and so forth, are not always very clear. Where there is a tribal mix, we might have the head of a tribe who is also the head of the state, or tribes with their own armed forces, clashing with other segments of the state. It is very difficult to sort out who is who, and who is doing what for what purpose. In some cases, groups are part of the state, and then for any number of reasons they detach themselves from the state and fight the state in order to overthrow whoever is in charge while replicating the same kind of structure that existed before. The participant appreciated that the Project's task is a very difficult one, and that the framework is a work in progress that has to be adopted to different cases. There is no general framework for analysis that can be mechanically applied to each and every case in order to understand these societies.

Another participant followed up on the distinction between states and violent actors. He wondered how other groups which are clearly violent but are not necessarily trying to overthrow the government, such as vigilantes, street gangs, the drug cartels in Mexico or Colombia, private security guards, etc., fit into the ANSA construct. He remarked that there is almost a sense of an 'anti-state' aspect to these violent groups that it is a domain worth exploring.

In reply, Dr. Moore framed the question in terms of how broad we want 'ANSA' to be. For the purposes of the Project, he narrowed it quite significantly, limiting it to autonomous actors who have the capacity to employ violence in the pursuit of political ends. This still leaves quite a range of social groups that engage in violence in society. He noted, for example, drug cartels and mob organizations are criminal organizations that use violence for their personal enrichment. In that sense, they would not be classified as ANSAs according to our definition. Similarly, groups that engage in violence like street gangs and biker gangs, or those that engage in violence with their neighbours because of racial prejudice or similar motivations would not fall into the category of ANSAs because there is no political dimension to their use of violence. We obviously run into

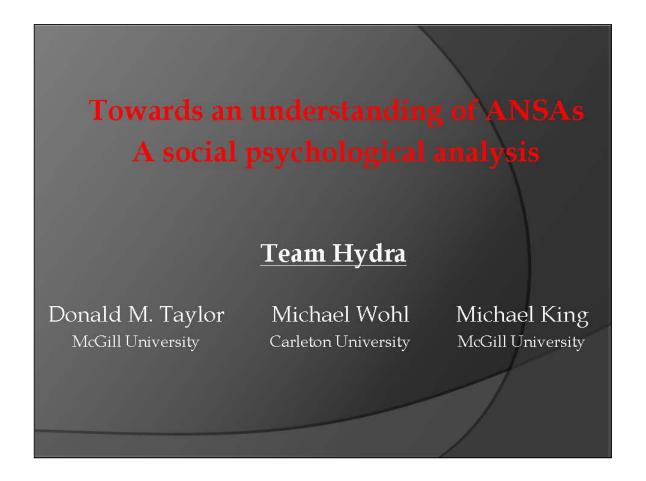
practical problems in trying to distinguish groups even along these lines. For example, what is the FARQ [the *Fuerzas Armadas Revolucionarias de Colombia* or Revolutionary Armed Forces of Colombia]? Is it an ANSA? Or, given its connections to the drug trade, is it just a criminal organization? Or is it both? It is a very difficult problem. Dr. Moore admitted to having struggled with this and having tried to come up with typologies and definitions that distinguish these armed groups – e.g., private security guards, war lords, tribal militias and others – from ANSAs. It was very difficult, and ultimately, he said, he moved in the direction of trying to keep the definition broad but with some parameters that at least keep it from becoming so all-inclusive as to be useless.

In a final word on Dr. Moore's strategic role taxonomy, one participant noted that this top-level typology and labeling is useful for sorting and framing one's thoughts. The participant recounted participating in a project that examined strategic deterrence for the 21st century for Violent Nonstate Actors (VNSAs). What we need to know and gather information about is the framing and thinking of others: how they see us, and what they think about what we are going to do, from the standpoint of capabilities, decision-making and motivations. Maybe a top-level sort of framing piece is where these things actually lash out and become more useful for us. The participant thought this might be a useful place to start rather than with individual questions of motivations and decision-making which might be a bit too low level. Therefore, in this participant's opinion, this typology makes a lot of sense.

2.5 Session Five – The Motivated ANSA: Collective Identity Under Threat (D. Taylor, M. Wohl and M. King)

2.5.1 Presentation

Editor's Note: No speaking notes are available for this presentation.

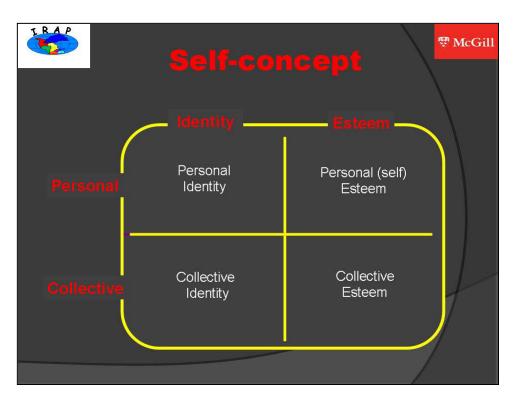


Towards an understanding of ANSAs

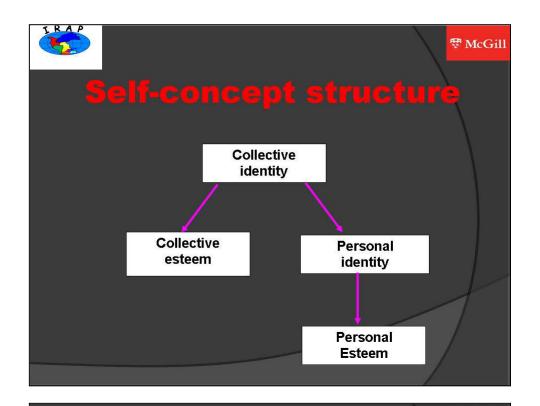
- Mission: from reality to identity
- The functions of identity: understanding ANSAS (DMT)
- Identities under threat: the emotional state of ANSAS (MW)
- ANSA identity: The power of a collective narrative (MK)
- Theoretical, methodological and applied directions (DMT)

The Functions of Identity DMT

- Social Identity has put the focus on Identity
- Tribal Identity: Rebounding from Globalization
- The Primacy of Cultural Identity
- Implications for engaging ANSAS







Towards an understanding of ANSAs AGENDA

- Mission: from reality to identity
- The functions of identity: understanding ANSAS (DMT)
- Identities under threat: the emotional state of ANSAS (MW)
- ANSA identity: The power of a collective narrative (MK)
- Theoretical, methodological and applied directions (DMT)

Threatened identities

- When social identities are threatened, we are motivated to defend them
 - Status or value threat (Branscombe, Ellemers, Spears & Doosje, 1999)
 - Distinctiveness threat (Jetten, Spears & Manstead, 1997, 2001)
 - Creeping influence of the West
 - Secularization
- Defence can entail efforts to define social identity in terms of 'key' attributes
 - Often it is a means to an end. It is about (positive) differentiation
- The group's goal is often to challenge existing power or status differences, gain political power, or achieve political autonomy
 - Conflict and Aggression

Intergroup Conflict

- •Requires three ingredients:
 - Group identification
 - Appraisal: Identity under threat
 - The ability to identify oneself as a part of one group and to observe differences in comparison with other groups is necessary for conflict
 - Emotion Reaction
 - Collective Hate, Fear, and Angst

Intergroup Emotions Theory

(Smith, 1999)

An event, real or imagined, will elicit an emotional reaction if it is perceived to be relevant to the "socially extended self"

Emotions and ANSAs

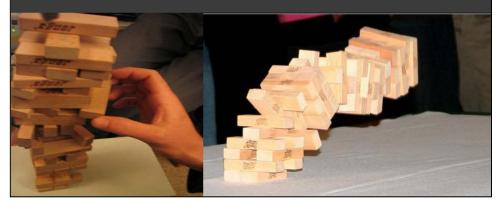
Why is understanding emotions important when trying to explain ANSAs?

- Behaviour
 - Specific emotions → specific action tendencies
 - Anger → approach (when group feels strong)
 - Fear → avoidance (when group feels weak)
- Individuals use power and politics to handle their differences and manage conflict

Collective Angst

Wohl, Branscombe, & Reysen, 2010, PSPB

- · Concern that reflect potential harm to the group's future
- May be removed from the group member's current lived experience
- Emotional response to perceived threat





Intergroup Hate

- Consistency appraisals: Is the situation consistent with what we want
- Legitimacy appraisals: Evaluation of whether or not a situation is fair
- Judgments of responsibility: What/Who is the origin of the threat

Can they hurt or harm → Anger and Hate

Hatred-Anger Interaction and ANSAs

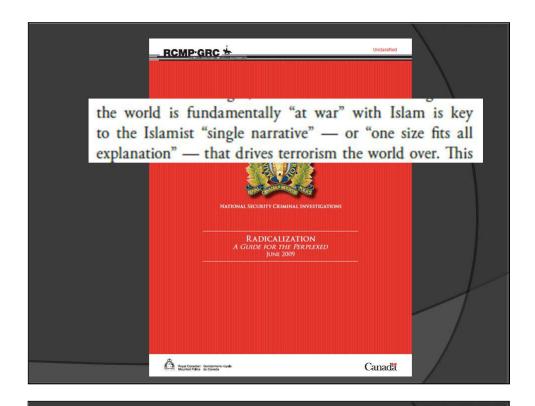
- All individuals who feel anger have the same emotional goal –to correct the behaviour of that group.
- Hatred involves the belief that an out-group is evil by nature and never will change (Halperin, 2008).
- Hence, if an individual has high levels of hatred, when he experiences an anger-evoking action of the out-group, he perceives it as resulting from stable characteristics of the out-group ---→ aggressive response is the only reasonable solution.

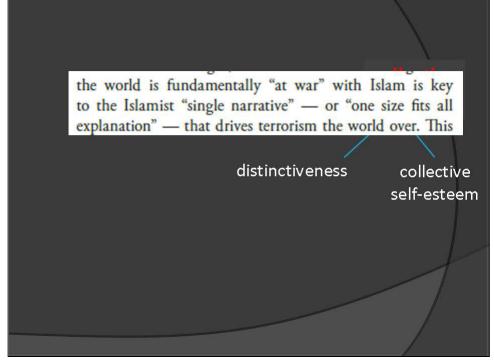
Towards an understanding of ANSAs

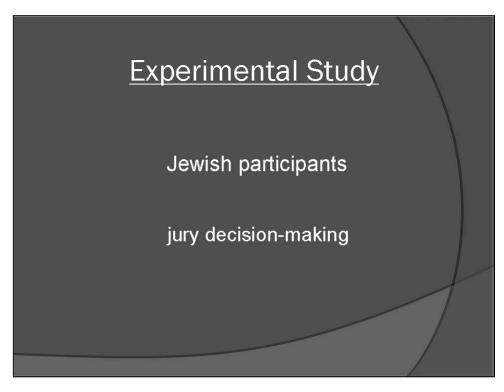
- Mission: from reality to identity
- The functions of identity: understanding ANSAS (DMT)
- Identities under threat: the emotional state of ANSAS (MW)
- ANSA identity: The power of a collective narrative (MK)
- Theoretical, methodological and applied directions (DMT)

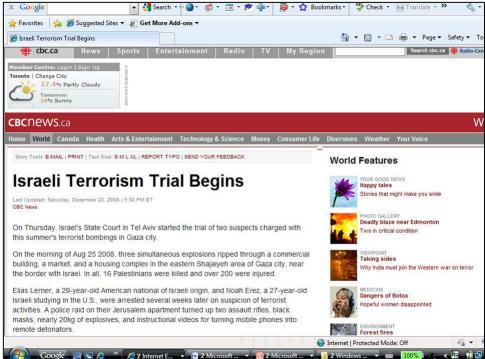
Social Representation of Events

rumours
conspiracies
legitimizing myths
history of a group
narratives of our group









Statement of Defense

The second text was a recruitment speech, a short of the threat to a b of the color of the type of type of type of the type of typ

The recruitment text ended with either promised social recognition for their

(justice condition), raising the

collective status of their group

(social identity condition), or the need for change (control

condition).

COURT DOCUMENT

The second text was a recruitment speech, a short

threat to group distinctiveness

Recruitment texts varied by the type of arguments used to justify the use of terrorism. Justification either focused on restoring intergroup equity (justice condition), raising the collective status of their group (social identity condition), or the need for change (control condition).

The recruitment text ended with either promised social recognition for their

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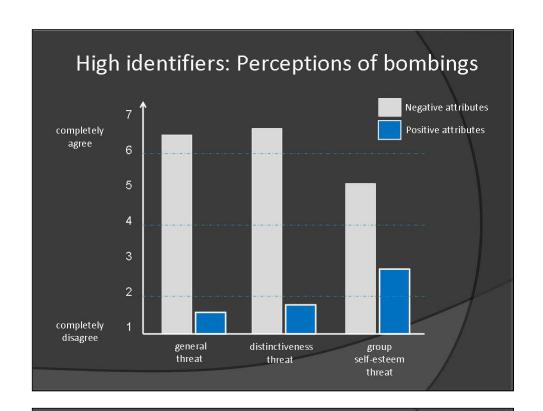
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Recruitment texts varied by the type of arguments used to justify the use of terrorism. Justification either focused on restoring intergroup equity (justice condition), raising the collective status of their group (social identity condition), or the need for change (control condition).

The recruitment text ended with either promised social recognition for their

Measures

- · Positive characteristics of the bombing
- · Negative characteristics of the bombing



Collective Narratives

- · Unconventional warfare: hearts & minds
- Truth is negotiated, not fixed

Collective Narratives

PSYOPS: Attempts to modify narratives

- · Follow rules of persuasion
- · Modifications introduced by ingroup members
- Support from critical mass

Towards an understanding of ANSAs AGENDA

- Mission: from reality to identity
- The functions of identity: understanding ANSAS (DMT)
- Identities under threat: the emotional state of ANSAS (MW)
- ANSA identity: The power of a collective narrative (MK)
- Theoretical, methodological and applied directions (DMT)

2.5.2 Question and Answer Session

The notion of social identity seemed to strike a chord with the group, judging from the calibre of the discussion that followed the presentation. With respect to the emotional dimension of ANSA members, one participant wondered whether emotions such as fear and anger are isolated; cannot one be both angry and fearful at the same time?

Dr. Wohl responded that people have multiple emotions, and the interaction between them can explain why people engage in one behaviour versus another, why one group might take the diplomatic route, for instance, while another may arm themselves.

Another participant raised the question as to why some stories 'stick' when others do not. From his research on the Irish people and the IRA, he had found the concept of *archetypes* [in Jungian psychology, an *archetype* is a pervasive idea, image, or symbol that forms part of the collective unconscious] to be useful. The story justifies and sustains the fight, even if it fails, because it fits the narrative.

Though Mr. King admitted that he had not explored this question closely, he noted a number of factors that might reinforce this 'stickiness' or resonance with the cultural narrative: for example, grievances or injustices that should be rectified, into which the 'fallen hero' archetype falls.

One participant framed his questions regarding the radicalization process in the context of overseas and domestic operations. Picking up on the presenters' discussion of self-esteem and how people feel disenfranchised and under threat, he recounted his experience in Afghanistan. The ideal in terms of PSYOPS in Afghanistan, he said, was to break in half the insurgent's group structure. He categorized the insurgents into two types. The "Tier Ones" are very motivated, very radicalized individuals that have education, influence, power and money. The "Tier Twos", on the other hand, are largely illiterate young men, "full of testosterone...often hopped up on hash or opium". They are the ones who actually do the fighting. The CF's PSYOPS focused on the Tier Twos, with the goal being to raise their quality of life so as to give them something to lose. When their quality of life improves, they tend to turn away from the insurgency. With respect to domestic radicalization, the Toronto 18 is a classic example, he said. All were middle-class individuals coming, for the most part, from prominent families. As another example, the individuals involved in the protests at the G20 summit in Toronto [June 2010] – as well as the members of the security forces – were largely of a mainstream mentality. Nevertheless, in both groups, there were radicals. Of the 10,000 to 20,000 protesters, some 160-200 were agressively violent, and, through fear and anger, a small group of the police force retaliated in kind. In light of these examples, how can the work being done on radicalization in this Project be turned into something with which to train, not only the security forces, but the mainstream populace at large?

Mr. King remarked that solutions have to be tailored for both radicalization at home and in overseas theatres of operations, though there is overlap. One solution will be anchored in in-group members. If ISAF [the International Security Assistance Force in Afghanistan] or the Government of Canada says "Jihad is not good", this will only increase its allure, especially for the young and disenfranchised, who are attracted to it because of its counter-culture/countergovernment aspect.

In other words, radicalization is driven by youth rebellion as well, suggested a participant.

Mr. King thought it was. He recounted a study he had just completed in which he asked members of the Muslim communities in Canada how radicalization occurs. There were the expected explanations such as misreadings of Qur'anic verses, and perceptions that Islam is under attack. Yet one explanation that he repeatedly heard was that "they are just young guys". People kept referring to the characteristics of young men: "they are emotional"; "they want to do something"; "they are young guys attracted to conspiracy theories"; "they are attracted to the hero and warrior-like activities". As an aside, Mr. King thought it would be interesting to study young homegrown jihadis and people who join the army voluntarily. There may be some overlap there, but he was not sure.

Later in the session, another participant returned to the radicalization process. He suggested that there is not much difference between homegrown terrorists and the "young lads in Afghanistan". They are individuals with a serious grudge who are willing to turn to violence. In terms of tools, the Project had already provided one, he thought. As a military practitioner, he was not looking for a piece of software as much as a different analytical framework to apply and an approach to unpacking the problem. In this sense, the Project is on the right path, in his opinion. It had helped him look at the problem from a different perspective.

Dr. Wohl provided an anecdote from his field work in trying to understand the motivations of the Tamil community. He had met with members of the Toronto Tamil community at a function some months earlier. As he and one of the community members left the restaurant and arrived at their cars, there was a scratch across the latter's car. The Tamil said that a Sinhalese had done it. How did he know? Wohl asked. The Tamil replied, "I know".

Attributions, said Dr. Wohl. *They* [i.e., the out-group (the Sinhalese, in this instance)] are responsible. Through conversation, Dr. Wohl recounted, you can sense the hate, made explicit later on in the conversation: "they are trying to undermine who we are"; "they are trying to destroy us"; "you saw what they did last year to us, and they are trying to wipe us off the map [referring to the Sri Lankan military offensive against the Tamil Tigers in the Northern Province, 2008-2009]. We are strong people. We need to defend ourselves."

Our actions are due to the oppressor, as Dr. Wohl summed up the sentiment. The oppressor chooses the actions of the oppressed. One sees the narrative that is growing in the community. How can we undo it? One of the interesting things coming out of this and other conversations, Dr. Wohl noted, was that the Tamils wanted to talk. They wanted to be recognized. They wanted to be seen as valuable human beings by the Sinhalese. They wanted a voice. Moreover, they see this through their hatred, he said, aggression, in their view, being the only way.

2.6 Session Six – Decisions Under Fire: Insights on ANSAs from the Science of Team Decision Making (E. Salas)

2.6.1 Presentation

Editor's Note: No speaking notes are available for this presentation.

ANSA Decision Making Literature Review: Progress Update

DRDC-Toronto October 26, 2010

> Eduardo Salas, PhD Marissa L. Shuffler, MA Rebecca Grossman

Overview

- Purpose
- Assumptions
- Methodology
- ☐ Group Decision Making: What do we Know?
- ANSA Decision Making: A Framework
- Findings
- Thoughts on Road Ahead

Purpose of ILR

- Armed Non-State Actors (ANSAs) have become increasingly involved in both fueling and resolving persistent social conflict
- Need to understand:
 - How these groups make decisions
 - What influences their decision making processes (e.g., antecedents, moderators)
 - Future research needs

Assumptions

- Drawing primarily from psychology literature
- Utilizing terrorist group literature as appropriate, but acknowledging there is a difference
- Including literature from the past 20 years
- Major contribution of the review is to explore the antecedents and moderators/mediators that may affect which decision making process is utilized by ANSAs (NDM vs. CDM) in a given situation

Literature Review Methodology

- Created list of key terms
 - Rational decision making, recognition primed decision making, group decision making
 - ANSA, non-state actors, terrorism
- Identified set of databases for gathering articles:
 - PsycInfo
 - Ebscohost
 - ProQuest
 - DTIC
 - ABI Inform

Initial Literature Review Search

- Over 100 articles, technical reports, other relevant documents found in search
- Have reviewed these to inform our understanding of:
 - General group decision making theory and empirical findings
 - Factors that may specifically influence ANSA decision making

Group Decision Making: How do groups actually make decisions?

- Classical decision making (CDM)
 - Use of formal normative models of choice between options
 - Decision makers try to maximize expected utility of a decision
- Judgment and decision making (JDM)/Behavioral Decision Theory (BDT)
 - Focuses on the concept of errors due to biases
 - Errors are fundamental flaws in decision maker

Group Decision Making:

How do groups actually make decisions?

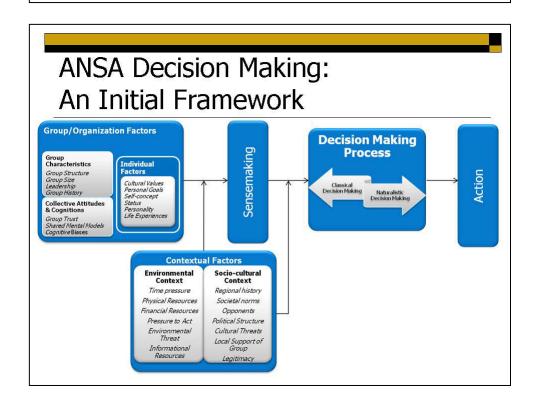
- Naturalistic decision making (NDM)
 - More applicable to real-world decisions
 - Focuses on how people develop options for decisions based on contextual constraints
 - Emphasizes the expertise of the decision maker
 - Process-oriented

ANSA Decision Making: An Initial Framework

- We know a lot about group decision making in general, but this is not necessarily ANSA relevant
 - Much is on juries, teams/crews, students
- Little literature available regarding ANSA decision making
 - Have to draw upon related groups, such as terrorist groups

ANSA Decision Making: An Initial Framework

- Building on general group decision making & related literatures, we have created an initial ANSA-specific framework
- Designed to help guide and integrate findings
- Includes:
 - Antecedents to ANSA DM
 - Group/organizational factors
 - Individual factors
 - Contextual factors that may moderate:
 - How antecedents are interpreted by ANSAs
 - What types of DM strategies are utilized



Individual Factors

- Regardless of the type of group, individuals bring their personal characteristics into a group setting
- Individual characteristics may include:
 - Cultural Values
 - Personal Goals
 - Self-concept
 - Status
 - Personality
 - Life Experiences
 - Expertise

Individual Factors

- These individual characteristics may impact the group, and in turn, the group's decision making process
 - Example: Belief systems
 - Individuals bring their personal beliefs regarding societal norms, religion, politics, responsibility to the community/greater good
 - These beliefs in turn influence the development of group norms, such as viewing themselves as political elite fighting for a righteous cause, and view those who oppose them as evil
 - This belief system can also influence the way individuals interpret information that will inform the decision making process, and the value placed on the costs and benefits involved in a decision

Group/Organization Factors

- Characteristics of the group or organization as a whole that play a role in the decision making process
- Two components:
 - Group Characteristics
 - Group Structure
 - Group Size
 - Leadership
 - History

- Group Collective Attitudes & Cognitions
 - Group Trust
 - Shared Mental Models
 - Cognitive Biases

Group/Organization Factors

- Examples
 - Group Characteristics: Group structure (Enders & Jindapon, 2009)
 - Hierarchically structured groups: decision making might involve only a few, high-authority group members
 - Flatly structured groups: decision making might be decentralized
 - Collective Attitudes & Cognitions: Cognitive biases (McCormick, 2003)
 - Terrorist groups are particularly susceptible to biases (e.g., groupthink) because of their clandestine nature; decision making is often a closed, inward process

Contextual Factors

- Factors external to the group that largely contribute to the decision making process
- Two components:
 - Environmental
 - Time pressure
 - Physical resources
 - Financial resources
 - Pressure to act
 - Environmental threats
 - Informational resources
- Socio-cultural
 - Regional history
 - Societal norms
 - Opponents
 - Political structure
 - Perceived legitimacy
 - Cultural threats

Contextual Factors

- Examples
 - Environmental context: Pressure to act (McCormick, 2003)
 - If groups do not engage in actions periodically, they risk losing visibility and influence in the public eye
 - Socio-cultural context: Political structure (Post, Ruby, & Shaw, 2002)
 - Knowledge of who holds political power, what steps can be taken to achieve group objectives, and level of resistance can influence decisions regarding which actions, if any, should be taken

Decision Making Strategy Selection

- Depending on the interpretation of inputs and contextual factors in a given situation, groups will select from a continuum of decision making strategies (CDM, JDM, NDM)
 - E.g., when faced with time pressures and uncertainty, groups tend to use NDM because they can draw upon previous experiences and expertise

Sensemaking

- Individual and group/organizational factors influence how ANSAs make sense of the situation surrounding a decision
- This relationship is further moderated by the contextual factors
 - E.g., ANSA leadership structure could influence who is involved in the decision making process, but this may be moderated by time pressures (e.g., may have to call upon others outside of leadership structure)

Findings

- In general, when making decisions, groups will either:
 - Involve everyone: bring a set of individual positions to group consensus
 - Use a "judge-advisor" system: multiple inputs, but one key decision maker
- Groups rarely combine individual input in an optimal way!
- External factors heavily influence group decision making process...

Findings

- Individual factors influence the weighing of costs and benefits...
 - Individual ideals influence which costs and benefits are valued and how much weight is given to each option
- Group/Organizational factors influence DM strategy selection...
 - Terrorist groups often adopt the norms and procedures of their predecessors, and might base decisions on a traditional course of action rather than on the specifics of the situation at hand (Dunn, 1972; McCormick, 2003).

Findings

- Contextual factors can impact how effective ANSA decisions are...
 - A group's ability to make decisions is influenced by how much information is available about the situation, such as who are the key actors, and what the potential costs are.
- General focus of group/terrorist DM literature more on rational decision making, less on approaches like NDM...
- Overall, support for our organizing framework...

Challenges

- Lack of empirical evidence
 - Most literature found thus far is theoretical or case study
- Lack of ANSA-specific literature
 - Drawing upon terrorist group DM literature, but this is not the same!
- Lack of available literature regarding decisions NOT to act

Thoughts on Road Ahead

- Expand our knowledge of ANSA DM (feasible?)
 - Historiometric approaches
 - Can be used to analyze existing sources of data relating to ANSAs
 - Interview records, newspaper and magazine articles, audio and video recordings
 - Uncovers relationships, identifies important situations, minimizes experimenter biases, examines behavior in its natural social context

Thoughts on Road Ahead

- Interviews
 - Researchers can establish contact with former ANSA members and pose a series of questions relating to decision making
- Qualitative studies
 - Observation, social network analysis

Thoughts on Road Ahead

- Archival data
 - Analyze group documents, records
 - Can explore characteristics of the group and the context in which the decisions were made
 - Provides a one-sided view of decisions in that most of the available information will focus primarily on decisions that had negative outcomes

Thoughts on Road Ahead

- Development of training to better understand, intervene in ANSA DM
 - Information...
 - Demonstration...
 - Practice...
 - Feedback...

2.6.2 Question and Answer Session

Many participants were struck by the similarities between ANSA decision making processes and those in their own organizations. One participant, for example, observed that the suboptimal decision making practices of terrorist groups seemed familiar to him from our own organizations. He wondered whether Dr. Salas saw a "quantum difference" in how terrorists make decisions as compared to the normal day-to-day decision making in our organizations?

Dr. Salas replied that, at the macro level, of course not. Decision making is decision making is decision making. At the macro level, the processes are the same. The devil, however, is in the details. Culture trumps everything. That is the hard part when moving ahead, to go deeper into the cultural dimension and bring those insights to the Project.

Dr. Moore added that there are contextual differences as well between ANSAs and "normal" organizations, in particular, the element of secrecy and the threat of death. When pulling together the Project team, he said, he did not have to find some clandestine place to meet where the team could feel reasonably sure that no one would "kick down the door". In a general sense, the decision making processes are the same, but, as Dr. Salas said, the devil is in the details, and some of those details are pretty nasty.

Another participant asked whether Dr. Salas had examined the notion of battle rhythm? The Canadian elements tasked in Kandahar had a certain rhythm to maintaining situational awareness: commanders are briefed, there is a cycle of information. How does battle rhythm affect decision making, and is it possible to get a sense of the battle rhythm of an ANSA?

Dr. Salas admitted that he had not looked at that, but that it would be interesting.

One participant suggested that there is a motivation, in terms of human laziness, for people to apply naturalistic decision making (NDM) in their decision making processes when, in fact, they have the time available to do a very rational structured approached. They resort to naturalistic decision making and call those "instinctive shots".

Dr. Salas agreed that this was correct, but he noted that there is room for everything in decision making. If you have time, take the time, get more information. If you do not, then rely on experience.

Following up, another participant observed that the other two decision making approaches [Classical Decision Making (CDM) and Judgment and Decision Making (JDM)/Behavioural Decision Theory (BDT)] concern single event decisions – it is about bringing information to a point where one decision is made. The NDM approach, on the other hand, is typically about a string of decisions and situational assessments made under time pressure.

Dr. Salas agreed with this distinction. Another related aspect that he wanted to highlight was that teams do not make decisions – individuals make decisions. Some argue that it is one or two individuals who forge a consensus, but it is one person who makes the decision.

One participant thought that, the more a group is institutionalized, the less individual differences would be important.

Dr. Salas did not disagree with this, except to add that individuals are embedded in organizations. Of course, he acknowledged the organization or institution influences the policy, the procedures, the signals that are sent about what is important. But it is one individual reading whatever the institution wants in the decision. That is why he says that teams do not make decisions, but individuals. It is the influence of the organization, or where they are embedded, and that is why history/context is included in the ANSA decision making model.

One participant thought that Dr. Salas had not rightly brought up group or organization structure. Structure cannot be divorced from decision making processes, in his view. He thought the effect of technology on the ability of an organization to make decisions is particularly interesting. He cited the example of the FLQ [Front de libération du Québec or Quebec Liberation Front], organization in Canada in the 1970s. It could not "get its act together" because its cells were discrete and divorced from one another. With today's technology, they might have been connected along the lines of, say, the Tea Party in the US. The new technology enables different structuring and different relationships themselves, in terms of the negotiation of narratives, actual decision making processes, sharing courses of actions, options, and the like. Technology is the enabler.

Dr. Salas agreed that the size of the group influences decision making, whether very small or very large. There is a psychological sense of security that comes with size that influences decision making as to target selection, the type of weapon used, how bold you are. The size and support structure or architecture associated with size – whether it is stealth or strength – will influence decision-making.

Group size, organizational size, history, connectedness, and the operating environment have been shown to be highly correlated with the mentality or the propensity to engage in collective violence, Dr. Salas noted. Connectedness might be linked to technology.

2.7 Session Seven – Day One Summary (J. Moore)

In summing up the day's discussions, Dr. Moore began with an apology. Having prepared for or worked on the Project for the past three years, he said, he had come to take some things for granted, in particular with respect to the concept of 'armed non-state actors'. Essentially, 'ANSA' refers to insurgents, terrorists, freedom fighters, revolutionaries, rebels or similar commonly-used terms.

Why use 'ANSA', then? Why not use 'insurgent' or 'terrorist'? The reason is that there is emotive baggage associated with these other terms, in some cases positive as in 'freedom-fighter' or, for some, 'revolutionary', in other cases negative as in 'terrorist' or 'dead-ender'. What is needed is a neutral analytical term that helps us define a slice of the actors in the battlespace, but does not unconsciously prejudice our assessment of those actors through the terminology we use. By using the term 'ANSA', we are trying to eliminate the biases associated with other, more loaded terms. These points are critical, Dr. Moore said, and he should have made them up front in his earlier discussion of ANSAs. He hoped this explanation clarified matters.

Are ANSAs the only groups in the battle space? Clearly not, Dr. Moore said. Are they the most important groups in the battlespace? Not necessarily. ANSAs are certainly a part of the complex equation in the battlespace, but there are other groups – criminal groups, militias, warlords, private security companies – who also populate that space. These other groups would not necessarily fall into our working definition of 'ANSA' if the basic elements of autonomous decision and the use of violence for political ends are not there. 'ANSA', as conceived in this Project, is not an umbrella term that encompasses every actor who is not formally part of the state. Nevertheless, that does not diminish the importance – in some cases, the overriding importance – of those other armed groups.

Why, then, focus on ANSAs? Because that is our job in Adversarial Intent, according to Dr. Moore. AIS is tasked to look at the 'bad guys' and to better understand their motivations, intent and behaviours. Should we be looking at the population more broadly or other actors in society? Certainly somebody should; it is critical that this be done, but that is not the job of AIS. While we recognize the importance of other actors within the battlespace, our focus is principally on ANSAs because that is our mandate.

In reaction to Dr. Moore's comments, one participant observed that not all ANSAs are 'bad guys' and that, while they may be a bad guy today, they may not be tomorrow. And if we understand them better, then we are better positioned to influence them rather than having to kill them. So there is something fundamental in the definition of ANSA that has been chosen for the Project. ANSA members are not just terrorists or insurgents. They are also tomorrow's nation-builders.

Dr. Moore agreed with this observation, and cited the example of the insurgents in Iraq who, when fighting US and coalition forces early in the conflict, were labelled "Anti-Iraq Forces" but, when they turned against al-Qaeda in Iraq (AQI) after the Anbar Awakening suddenly became the "Sons of Iraq" in the eyes of the Americans, a very different label for what are essentially the same groups.

Dr. Moore then sought to tie the day's presentations together. He hoped the participants could begin to see how the different pieces of the Project's puzzle were falling into place. Taylor/Wohl/King's work gives a sense of the socio-cultural context in which ANSAs operate. Salas's work probes the decision making processes of groups embedded in this context. Dr. Moore's own work on the strategic roles of ANSAs provides one way of conceptualizing the behavioural outcome of these group decision-making processes.

He then laid out the goal for the next day's sessions. On Day 2, the group would look forward. As the Project moves to its second phase, there are a number of challenges facing it, especially if case studies are to be done. What are some of the methodological issues that the Project is liable to confront? There are practical issues associated with studying ANSAs in non-permissive environments. Certainly, the military experience in the collection of intelligence on adversaries could and will inform the methods and techniques that might be used in the second phase of the Project. This is part of the discussion that he hoped the group would have in the next day's sessions.

3.1 Session One – Overview of AFRL Research on VSNAs (L. Fenstermacher and R. Warren)

3.1.1 Presentation

Editor's Note: Partial speaking notes are included here for the Fenstermacher presentation. Approval for reproduction of the Warren presentation in this TN was not received prior to publication and, consequently, the slides are not included here.

Due to time restrictions, there was no Question and Answer Session after these presentations.

Adversary Modeling Efforts in RHXB



Laurie Fenstermacher Anticipate and Influence Behavior Division Air Force Research Laboratory



Behavior Signatures

Human centered sensing/exploitation

Integration of Behavior Modeling into Layered Sensing

Behavior Modeling to cue and interpret data/info

Neuromorphic Computing

Simulation/Gaming for signature discovery, development of sensing strategies

Influence

Enable precise targeting and effects through vulnerability modeling, research on precaution and vigilance

Vulnerability modeling

Trust, organization effectiveness

Precaution and vigilance consortium

Enable near-continuous influence assessment based on causality, not correlation

Speech, Discourse Processing/Analysis

External funded projects – applied research

- SAVANT
- SCIPR
- Sandia Influence Modeling

Forecasting

Analytical Framework

Sensemaking Support Environment

- Cascading Air Power Effects
- Discourse Analysis

External funded projects

ICEWS

Strategic Multilayer Assessment Projects

JIPOE

PAKAF



Briefing Roadmap



- Who are we? (RHX)
- · Focus of research
- Previous work of interest
 - Evolution of Terrorist Group
 - Strategic Multi-layer Assessment Projects
- Current work of interest
 - Detection of "phase changes"
 - Discourse Analysis
- Conclusions

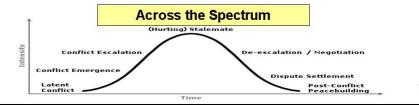
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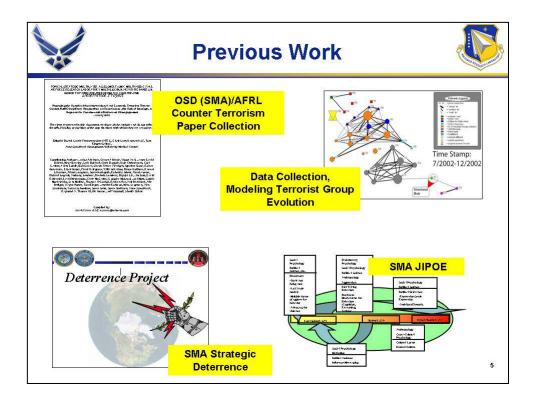


Who are we?



- Multi-disciplinary group of scientists and engineers
 - psychology (org/social/experimental/cognitive), anthropology, economics, comparative religion, mathematics, physics, computer science
- Building on long legacy of cognitive/behavioral modeling (former DMSO lead for behavior modeling) focused on blue performance (flying, maintenance) – now focused on red/green/blue Cyber, Influence, ISR, Analyst Sensemaking
- Global problem requires global focus one person TDY 6 months at NATO HQ, one PCS'd to Belfast
 - Need to question things that are considered "a given"...





Rosetta Project: Objective – Develop a LOW-TECH paper and pencil test battery to assess cognitive styles of new and uncharted cultural groups.

Always given in local language.

Three perceptual and 3 cognitive sub-tasks in Phase I.

Rationale: Below-awareness perceptual and cognitive variables related to analytic and holistic reasoning are important in unexpected or novel situations when people must make rapid judgments or react quickly.

Phase I: Data collected in Japan, Korea, Taiwan and the US.

Phase II: Data collected in Singapore and Malaysia.



Strategic Multi-Layer Assessment (SMA)



- SMA provides planning support to COCOMs (request from Flag Officers)
 - Requires multi-agency, multi-disciplinary approaches
 - Solutions and participants from across USG and beyond
 - Products transitioned to requesting COCOM planners and/or designated supporting agencies for sustainment
- SMA Efforts Supported
 - Paper Collections
 - Sudan Strategic Assessment
 - Strategic Deterrence in the 21st Century
 - Joint Intel Prep of Operational Environment: Indications and Warnings for WMD-Terrorism
 - Rich Contextual Understanding of Pakistan and Afghanistan (PAKAF)

6



Paper Collections



- Counter Terrorism: "Protecting the Homeland from International and Domestic Terrorism Threats: Current Multi-Disciplinary Perspectives on Root Causes, the Role of Ideology, and Programs for Counter-radicalization and Disengagement "
 - Root Causes
 - Dynamics
 - Role of Ideology
 - Counter-radicalization, Deradicalization/Disengagement
- Other SMA Paper Collections
 - Detection of Rare Events
 - Collaboration
 - Instability
 - Countering Violent Extremists*
 - Neurobiology of Political Violence*

7



Deterrence Problem Statement

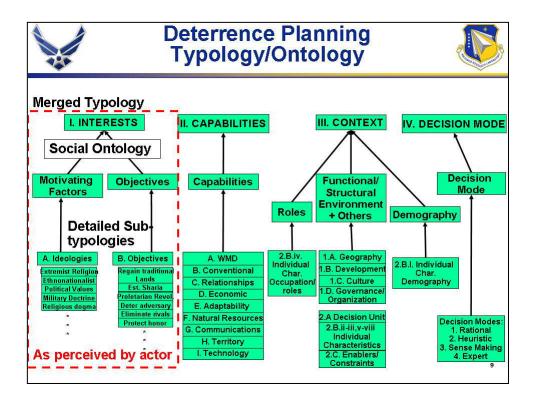


Establish a typology to aid deterrence planners in identifying the information about an adversary, whether state or non-state, needed to produce "greatest confidence" options for deterring the adversary from acting in contravention to U.S. national interests

"...what do I really need to know about an actor so that I can build a plan to deter him as early as possible--most desirably, even before he forms an intent to act to the detriment of US national interests?"

Lt Gen (ret) Elder

- 1. Identification of key influence attributes of 21st century international system actors.
- 2. A process to assess and represent those attributes to help focus influence efforts on likely deterrence "opportunities".
- 3. An operator-friendly tool that is scientifically grounded but carefully represents uncertainty and sensitivity for the user.
- 4. The formulation of a concept to go "active" to create I&W and MOE opportunities.





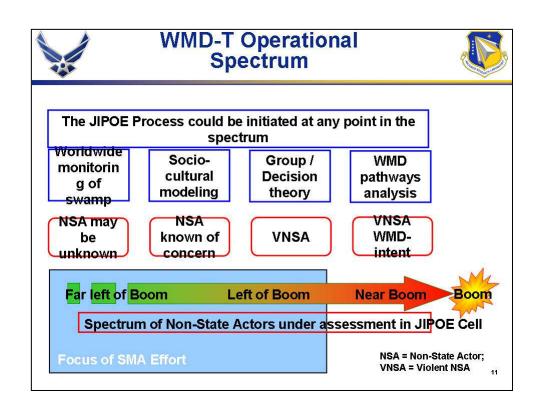
Goal:

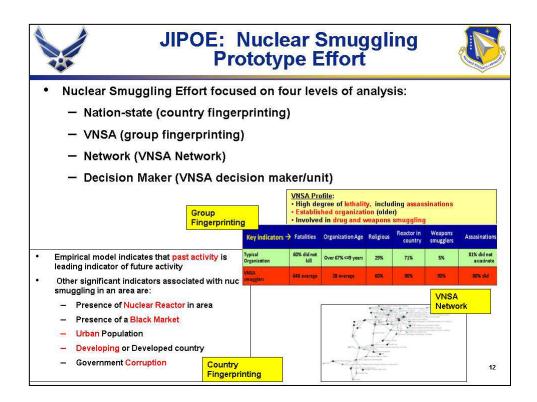
- Develop predictive analysis capability
- Anticipate how terrorists are likely to acquire and use WMD over the next ten years – maintained in near-real time
- Apply models to forecast, characterize, identify and name areas, entities and persons of WMD-T interest
- Provide means to target areas, entities and persons facilitating adversary WMD courses of action

Approach:

- Develop tools to anticipate/forecast WMD-T rare events
- Emphasis on terrorist motivation/intent alongside terrorist capability
- Develop attributes and associated indicators...grounded in empirical and statistically valid research
- Use polling data and models of stability and radicalism as inputs to profiling assessment, red teaming and information fusion for inference

10





Nuclear Material was defined as fissile material, HEU (Highly Enriched Uranium) and plutonium for the unclassified analysis.

Under which conditions is the VNSA of interest most likely to engage in nuclear smuggling for own use or sale?

Result:

BLUF: decision analysis suggests a group has the most robust incentive to pursue nuclear material for **profit** rather than use; i.e., it is more sensitive to financial pressure than physical pressure by the home government or the US.

With current leadership, the group's circumstances should be:

- a) exceptionally extreme;
- b) alternatives limited to the group suffering violent defeat with no chance of renewal to support its **intent** to pursue nuclear material or weapons for its own use.

Less extreme political but dire financial pressure prompts (i.e., is a key indicator of) increased likelihood of a group's pursuit of materials or weapons for re-sale.



Bio-WMD Exploration in the Dark Web Collection: A Preliminary Study



Goal: Identify potential Capability and Intent of WMD-Terrorism threats Dark Web Archive

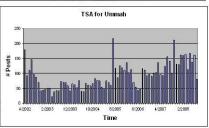
 Contents of 1,000+ extremist/terrorist sites in Arabic, Spanish, English; >2 TBs, 10,000 sites

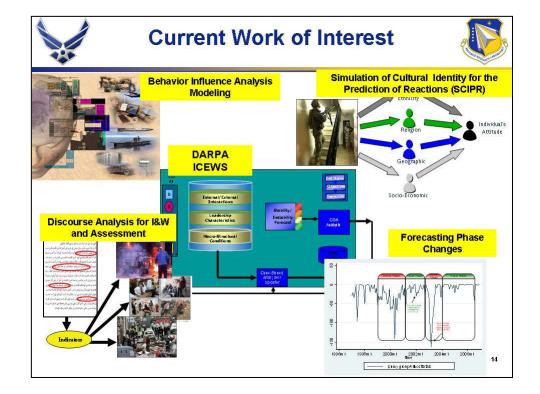
Approach: Using keywords (from DoD, CDC, etc) to search for bio-threat content, analyze results for capability

Results — Most search results appeared in one of the following contexts:

- · Links to sites with weapons prep tutorials
- Discussions of claims re: WMD threat (e.g., Al-Qaeda)
- Discussions of historical, current cases of disease (e.g., Avian, West Nile flu)
- Irrelevant discussions (e.g., terms such as "poison")
- Other analytical capabilities: determine roles of authors in discussion sites, technical sophistication of site, sentiment analysis, link analysis









Behavioral Influences Analysis



Obiective:

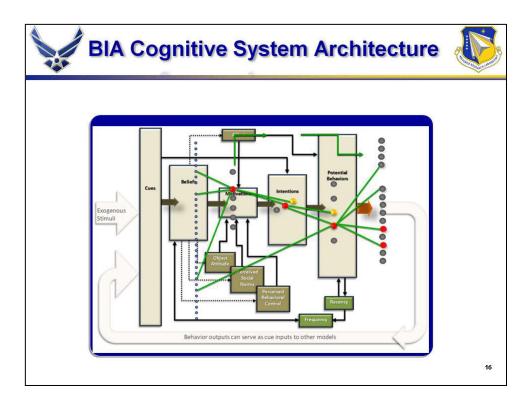
- •Develop behavioral influence analysis capability to assess target audience reactions resulting from potential actions and counter actions.
- ·Understand and shape behavior of individuals, groups, and organizations

Approach:

- •Develop social simulation platform that couples cognitive models with a cultural, economic, and policy-based, systems dynamics model (societal)
 - Cognitive models represent the psychological processes of humans, which are tailored by SME input to model specific individuals.
 - System dynamic models represent social, political, and economic processes of small group/tribes as well as geographical regions



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Current core cognitive system architecture

Humans are constantly exposed to a large number of endogenous stimuli (i.e., efferent or "top down" sensations) and exogenous (environmental) stimuli. In order to make sense of and predict one's environment humans attempt to find patterns in stimuli. When stimuli are recognized as cues, a specific pattern reflecting the type and number of cues can, and often does, produce a belief associated with the current environment. In this sense, a belief is an estimate of something or a state in an environment. When a belief rises to full consciousness it can be compared to a belief "template" that is stored in long-term memory. These templates are stored semantic perceptions of self and environment as beliefs and serve to categorize/classify and structure one's belief of one's world. As it is defined here, beliefs can be categorized as externally-focused, pertaining to the features of an object or situation. They can also be categorized as inwardly focused, pertaining to internal dispositions associated with current state or trait conditions.

Each belief that becomes activated will prime associated motivations. The primed motivations will compete against each other. The motivations that have the strongest congruence between 1) the respective motivation and the attitude towards it; 2) perceived social norms that favor the motivation; and 3) the perception that the action associated motivation can be carried out will become activated. An activated motivation will prime certain potential intentions. Primed intentions will become active if cues supporting the respective intentions are present. Each intention that has been activated will prime associated potential behaviors. The potential behavior(s) that ultimately become activated is a function of the type and degree of affect (positive or negative) that is associated with the activated perceptions. That is, an entity may have

an intention to do something, but how the intention is specifically carried out depends, in part, on the emotion state at that time.



- Determining psychological effects of a particular action is difficult, especially when the action is undertaken in an unfamiliar multicultural environment.
 - Cultural identities are multifaceted and dynamic.
- Objective: Create a software tool built on an agent based model that predicts the attitude of individuals in response to selected events based on social identity, social concensus
- · Accomplishments:
 - In operational use
 - Conducting validation
 - · Data collection in Afghanistan for one year
- Used in "Rich Contextual Understanding of Pakistan and Afghanistan" SMA effort for Gen Petraeus, MGen Flynn, IDC

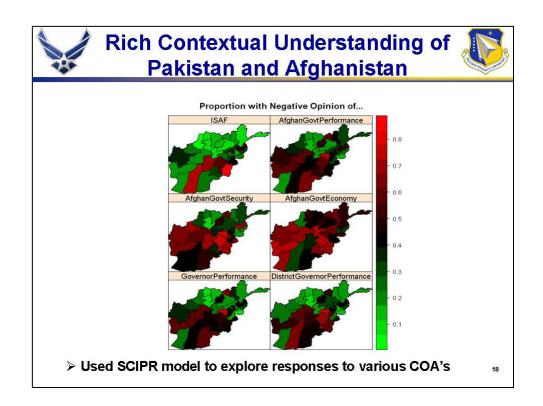
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To predict effects in a multicultural operational environment, it is essential to model individuals subscribing to multiple cultural identities, and to model the identities as dynamic and changeable.

Individuals possess multiple identities and often shift from one identity to another. People belong to multiple groups.

Views and identities may be dynamic, complex, and even contradictory within the same person. When a new group arrives on the scene, identities often shift, or new identities come to the fore.

Objective: Create a software tool built on an agent-based model that presents the predicted attitude of individuals in response to selected events accounting for the multiple identities with which people identify.





CAPES: Forecasting Phase Changes



Objective

•Develop models to predict macro phase changes (significant shifts in attitudes of groups, transitions from non-violent to violent or hostile to peace)

Approach

- •Data coding with disaggregated variables (govt, group behaviors, social, economic (PMESII) variables, sentiment, inter-group behaviors (e.g., competition)
- Leverage ICEWS Data Focus on Moro Islamic Liberation Front (MILF) in Philippines, Tamil Tigers (LTTE) in Sri Lanka and Awami League (Bangladesh)

Results

- Models have high positive, negative predictability with accuracy ranging from 87%-97%
- •Groups pay attention to the interactions of the government and groups
 - •Competing groups' violent activities increase the GOI's violence
 - •Repression of other groups has similar effect as repression of GOI
- Government repression yields curvilinear (inverted-U) or positive effect on dissident violence
- ·Mass attitudes shape government and dissident behavior
 - ·As support shifts towards the government, dissident violence subsides
 - •As it shifts toward the dissidents, dissident violence tends to increase
- •Structural conditions not very useful in time-series models

10

Goal: To model and forecast specific Groups' of Interest violent phase changes (i.e., campaigns of violence).

Definition of Violent Phase/Campaign: A series of sustained, planned and organized activities which utilize physical force to achieve benefits concerning the extraction and distribution of resources or values.

Theoretical underpinnings as a process.

Competing actors (governments, dissident groups, etc.) make interdependent strategic decisions and those decisions escalate and de-escalate conflict for Actions/Policies.

Actors compete for support of the larger population. The ebb and flow of support alters the actions of organized groups and governments. Structure.

Environments affect and alter actions but given limitations in data availability effects are mostly observable across space as opposed to time.

Case Selection:

Chose groups in concert with AFRL and Sandia National Lab.

Variation on motivation, characteristics and operational environment.

Five groups in 5 different countries (Most Different Systems Design):

- Tamil Tigers, Sri Lanka separatist group; non religious; ethnically motivated (Tamil);
- Moro Islamic Liberation Front (MILF), Philippines separatist/insurgent group; Muslim;
- Bangladesh Chhatra League (BCL), Bangladesh student social group, pro-democratic;
- People's War Group (PWG), India Naxalite, insurgent group; communist-oriented;
- Free Papua Movement (OPM), Indonesia separatist.

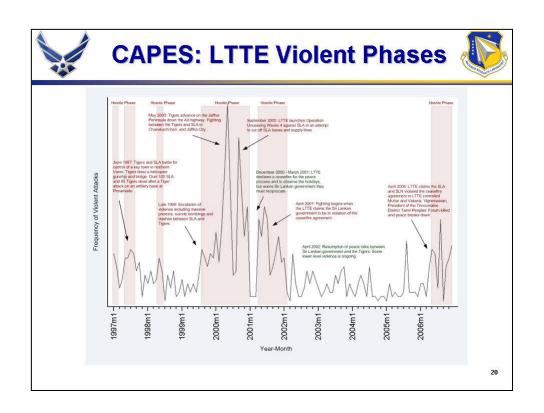
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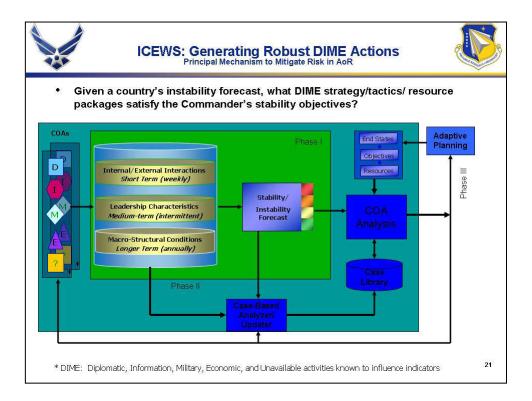
Behavior of relevant actors (i.e., governments, GOIs, competing groups) – Events Data.

Support for competing actors (i.e., governments and dissidents) – Automated Sentiment Data.

Environmental/Contextual Factors – Publicly available sources: World Bank, Polity, ILO, etc.

Econometric Models: Logit for phase shift and detection; regression for duration of campaigns; negative binomial for monthly violent events.





This chart shows the rest of the systems diagram. Once we have accounted for the symptoms of instability across the various sub-systems, we need to design DIME treatment effects to mitigate it.

So given a country's health assessment, and a forecast of where it is heading, and given the commander's objectives for that country, what are the relevant symptoms (levers on the model) that we want to affect with DIME treatments? What are the optimal array of COA's that we can bring to bear? And can we monitor their effectiveness in near real time, to adjust as necessary? Assessing these linkages between actions and effects will consume much of our time in Phase 2.



Analysis of Discourse Accent and Discursive Practices for I&W



Goal:

- •Identify a set of leading cues/indicators of adversary action based on analysis of discourse accent and discursive practices
- Develop a methodology to detect/extract/exploit these cues/indicators

Approach:

- •Identify existing or modified tools to operationalize the methodology Initial Development (Phase I)
 - Literature search in-group/out-group
 - Pilot study on Arabic documents
 - Develop prototype tool (rule-based coding) for linguistic cues for in-group/out-group
- Exploratory Development (Phase II)
 - Steps toward operationalization coding study with native Arabic speakers
 - Investigate another method cognitive complexity

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Phase I: Pilot Study with Arabic Documents



Effect	Phrase	Translation	Explanation	Citation
National Self- Glorification	الملك حمد بن عيسى أل خايفة عامل البلاد المقدى	King Hamad bin Isa Al Khalifa, the king of the <u>beloved</u> country	Rather than using the name of the country, a possessive ending indicating "our country," or omitting the word entirely, this phrase using which informs the audience how precisely they should feel about the country – or, equally, how the "in-group" feels about the country and thus how the audience should feel if they desire to be a part of that in-group.	C17
	جلالة الملك المفدى	His <u>beloved</u> Majesty	Ditto, with regard to glorifying His Majesty.	C17
	صاحب الجلالة الملك	His Majesty (= the owner of reverence / magnificence)	This reference's terminology would be expected from only the king's own people, the in-group; in addition, it intensifies the awe and distance	C17

Coding pilot study on 285 document Arabic corpus •Identified examples of indicators

- ·Lexicalization, quotations, references, allusions, etc.
- •Document methodology for analysis of in-group/out-group and their sentiments

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Phase II: In-Group/Out-Group Coding Study #2 Methodology



- Develop initial codebook based on results of 2 focus groups -- 10 Arabic speakers with discourse analysis background
- Validated and augmented the initial codebook based on coding study (1500 coded documents) -- 37 Arabic speakers
- Documented key rhetorical phenomena and intensifiers in new methodology

Rhetorical Phenomenon	In-Group	Out-Group	
Amount of attention:	Much attention	Not represented	
Opinions represented:	Fully represented		
Reference terminology:	Respectful terminology	Disrespectful terminology	
Groupings:	With "good" entities, against "bad" entities	With "bad" entities, against "good" entities	
Intimacy:	Close to "us"/the world	Distant from "us"	
Attributed power:	Powerful/involved	Weak/useless	
Attributed virtue:	Glorified/canonized	Immoral/irresponsible	
Attributed motivations:	Neutral/cooperative	Non-neutral/has negative motivations	
Attributed nature:	Bad attributes diminished, has fundamentally good nature	Good attributes diminished, has fundamentally bad nature	
Victimization:	Victimized/sufferer	Victimizer/aggressor	

Phenomenon

Particular Instantiation

Increases salience

Includes in title

Focuses attention

Notes first or near beginning

Notes last

Involves photo

Substantiates

Focuses on quantity/numbers

Uses examples/stories/imagery

Cites expert testimony/validating sources

Indicates naturalness of +/- grouping

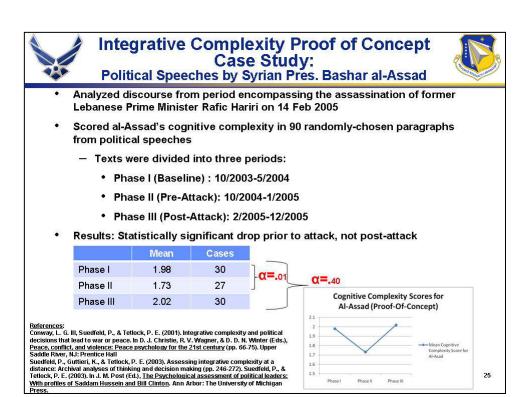
Intensifies

Uses intensifier/indicator of large magnitude

Uses repetition

Uses lists

Uses nominalization



Result: Statistically significant decrease in cognitive complexity in period immediately prior to the Hariri assassination. No statistically significant difference between post-attack period and baseline.

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Closing Statement(s)



- We understand people and groups and how to analyze and model them
- We understand the limitations and strengths of various methods/models and will be brutally honest
- · We are interested in contributing, supporting you
- We welcome further interchanges...

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Other Things of Interest



- SAS-074: Integration of Psycho-Social Methods and Models in Effects Based Approach to Operations
 - Concept Map based Decision Support/Education Tool for Analysts, Planners

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3.2 Session Two – Panel Discussion: Researching ANSAs – Questions and Methods

The moderator, Dr. Moore, framed the discussion in terms of two general questions he posed to the panel and to the group:

- First, what is the research question(s) to which we should give our attention in Phase 2 of the Project? There are a vast range of issues that could be addressed. Unfortunately, this is a small Project with limited people and limited resources. We must focus on one or two issues that will provide the most value-added for our effort. What we are looking for from our military colleagues is some sense of what would be the most use to you in terms of the questions you need to understand in order to cope with situations and operational environments where you encounter ANSAs on a daily basis.
- Second, what are some of the research methods that can be used to address these questions? This is a very difficult research area. ANSAs operate in non-permissive environments. Osama bin Laden does not respond readily to surveys. Both intelligence operators and academics collect data. Nevertheless, there is much we can learn from our intelligence colleagues on how to collect data in non-permissive environments.

These were the key questions Dr. Moore hoped would be explored in the panel discussion to follow.

The first panelist, **Dr. Salas**, outlined his thoughts on Phase 2. He would start, he said, with the end, the practical outcome of the Project. His intent would be to develop a training program to inform the CF about how ANSAs make decisions. From there, he explained, we work backwards. In order to design a robust training program, we need content. In order to design content, we need to decide where we are going to focus our attention. What is the context: ANSAs in Africa? Latin America? Europe? Everywhere? We need to focus on this as we design the training, to ensure that it is pertinent.

How do we go about doing that? To get content on ANSAs, we observe them or interview them. If that is not possible, the next best method is to do a content analysis of publications, magazines, newspapers, and interviews with previous ANSA members, to tease out the information needed on the traits, the thinking behind their motivations, from those articles. Dr. Salas remarked that his experience suggests that lab work will not do any good. You must go into the field for it to be relevant.

We must think of the end-state, then move backwards. If training is a desirable product, then these are the steps that must be followed. We need content to have training objectives that are pertinent to what the CF is interested in. To get the content, a needs analysis must be done, a more in-depth discussion that supplements the literature review that he and his team had done. If we can gain access to the population of interest, he concluded, we will have to be creative to get the needed information.

Dr. Wohl followed with an appeal for dialogue. He and his colleagues had laid out the theoretical framework and some of the issues from their Phase 1 work, he said. Now, they wanted to hear

from the group. What are your needs and what would you like to find out? What kind of information might you need, and what are the ways that you might be able to assist us?

Mr. King addressed the key issue of the research question. It is all about the question, he maintained. The question needs to be precise. Once you nail the question, then you can nail down how to investigate it. Different methodologies are better suited for certain questions than others. For example, lab experiments are appropriate if the question needs to specifically isolate certain factors. On the other hand, field research might be better if the question requires more contextual understanding.

Ms. Fenstermacher offered three thoughts as to what is most useful, based on past projects in which she has dealt with operators. The first is a reasoning tool – one that is transparent and straightforward – that helps the operator work through what is important to a group and how it is likely to respond. We are talking about a simplistic but human factor approach. Operators do not want a black box, but, rather, a tool for prompting them as to what they might want to think about

The second point she made was that other models are valuable but in a 'reach-back' sense. Collecting more data, doing some modeling, synthesizing the information – this provides a more powerful and complex 'reach back' report in addition to the straightforward reasoning tool.

Her third point emphasized the usefulness of an events monitoring tool. There is so much information out there – how can one ingest it, sort through it and visualize what is important to certain groups and the stability question? Work is currently being done on such a tool that will allow "drill down" to the document, but will help steer the operator's attention because there is too much information.

Dr. Taylor remarked that there are two words associated with the worthiness of a program: excellence and relevance (the impact of the program is assumed). In terms of excellence, one can find out about this in the past – it is only apparent in retrospect. As to relevance, he said that one principle guides him as a scientist: every single person in the world wants to tell him their story. They are desperate to tell it, if he treats them with respect and if they think their story is valuable. If this Project does not hear the voices of the people we want to talk to, then it is an absolute failure. Who do we want to talk to, then? ANSAs. Equally as important are the people who have to engage ANSAs. So, the people who engage ANSAs and ANSAs are the voices we need to hear. Those are the voices we must target. Anything less than that is unsuccessful.

Dr. Warren stated that research is data: new data or old data sets. We can take old data sets, for example, Ireland and the IRA bombs, and one technique is to allow yourself the data up to 1980 then predict the events of 1981. That is one kind of inspection model where the data sets exist and can be used as a baseline. Ireland, of course, is not Afghanistan. There are times when you need new data sets.

He emphasized that we need to be smart about culture. For example, when interpreting questionnaires filled out by people in different cultures using the 7-point rating scale to rate their feelings, South-east Asians tend to be more modest and holistic, and have the tendency to load up on the middle of the scale. The universe is very complex and a '5' does not mean a '5' across the universe. We have to take into account the cultural problem, and that is a very difficult problem.

Techniques are evolving but they are still not satisfactory. We must be aware of the cultural context for ANSAs. Where, then, do we want to study? Afghanistan, or five, ten or fifteen years down the road? Or are we looking for more general principles or theories?

Finally, theories should be able to predict where there were *not* problems, where there were many people who were repressed and belonged to out-groups but did not become revolutionaries or non-state actors. We have to be careful of cultural things and why people in certain areas become violent yet in other places, in worse conditions, they do not become violent.

In summing up the panelists' comments, **Dr. Moore** noted several points of convergence. Looking down the line, what is it we hope to produce: something along the lines of a training program, or a reasoning tool? Operators are not looking for another piece of software, but for a different way of thinking about the problem. What is the tangible product that they want: a training program that is geared towards helping people to gain a more nuanced perspective on ANSAs? What are the features or characteristics of such a program? What would it look like?

In terms of research and methodological issues, all the panelists agree that the research question(s) comes first and the methods fall out of the questions. Dr. Moore said he sensed a convergence on the notion of narrative. We talk about voices and stories, and wanting to tell stories. We talk about the narratives of ANSAs. It all seems to come down to this idea of the stories of the world as we understand it. We have to understand ANSAs' narratives, how they convince their target audiences as to the way they should be looking at the world. We also have our own narratives. How do they compete with that of the other? Given the limited resources we have, possibly we should focus on exploring this concept of stories more closely.

He then opened the discussion to the floor.

"Buy-in"

One participant noted that Canada is bowing out of Afghanistan within the next 12 to 14 months. He maintained that our focus has to shift from looking at *the* war to looking at *a* war. The discussions in the workshop have been at the strategic level. However, the reality that military operators live with and deal with is at the operational and tactical level. The concepts proposed in the Project have to be institutionalized and professionalized into our officer cadre and our senior NCO cadre so they can apply their skill set more capably on the ground and implement Canada's foreign policy. Directing his question to those panelists who have dealt with the military in the past, he asked where they found the greatest "buy-in" when delivering their research to the military, and more importantly, where they encountered the greatest resistance? In other words, how can we help you to help us?

Dr. Salas thanked him for his comments, and remarked that this is exactly the kind of dialogue we need. Where can we help you, the operator, and at what level? What kind of products do you need? These are the sorts of conversations we must have, he said. The fact that the military is here, that you are interested and that you are learning something different, is a good sign that we are making progress. We need to keep the discussion going. We need to come up with something at the tactical and operational levels. What is the information that you want that we can go out and collect with our resources? We are off to a good start, he thought.

Ms. Fenstermacher commented that the issue is to not get in the way of but to support the institution. The buy-in comes when you save them time, make them more efficient, and give them more confidence in their decisions or understanding, where they can explain why they are going to do something. Transparency is the key, as in "how did I get to that answer, and am I going to get to my answer?" Giving additional insight into the voices and minds of people, so I can get out of my tendency to just think like I think.

With respect to his work on home-grown radicalization, Mr. King noted that, after talking and spending time with intelligence operators in their work environment, he came up with better questions. This, he said, is the nub of our problem. We need to spend more time with the operators to get the questions from you.

Cultural Training

The importance of training – particularly cultural training – came up time and time again in the discussion. One of the objectives in training, it was noted, is to improve the troops' cultural sensitivity so they don't give offence where none was intended.

Dr. Warren reminded the group of the unintended consequences arising from inadequate understanding of culture. If you build a well, for example, and it changes the social structure of that group – they no longer bring the water back and have their group discussions enroute – you have disrupted the social communication patterns of exchanging information. Your well might be destructive, he warned.

Dr. Moore remarked that such cultural awareness training occurs at the 'boots on the ground' level. This Project, however, is not geared to that level. He thought it was aimed more at expanding the skill sets of the officer, and that it would be more useful to try to translate the concepts and constructs developed in the Project into products that are geared towards that segment of the military organization as opposed to the level of the private soldier.

One participant later challenged this, making the point that privates and soldiers should be exposed to this cultural training as early as possible so they can integrate more complex ideas and concepts once they reach the senior NCO or officer level rather than wait for that time.

Another participant maintained that the audience for such training is not so much the war-fighter as the analysts who are providing the inputs to decision making. For the military, *training* involves drilling a predictable response to predictable stimuli. What we really need, he suggested, is *education*, which enables response to an unpredictable state.

A third added that the whole notion of what we are doing, how people are doing it and what kinds of training are necessary are things that are moving quickly, and there is not enough time to assimilate or figure it all out. We need to analyze what we have been doing and how we could be doing it better. The education process is starting far earlier in the process and is theatre-specific. But on a more general level, specific information on understanding cultures needs to start much earlier.

What should we be training for? One participant thought that we are going the same way now as we did after Bosnia. Let us train for a better Bosnia. We are now seeing, let us train for a better

Afghanistan. Next time around, we may not need translators if we are going to, say, South America. Spanish is not a very difficult language. Moreover, are all ANSAs the same? Are Latin American ANSAs or European ANSAs different from African ANSAs? Can we have case studies that possibly prioritize ANSAs in different regions, given that we do not know where we are going? A broad range of prioritization might be the answer.

One participant asked what is the problem we are trying to solve? From his experience, we do not communicate effectively in a theatre in a way that influences non-state actors effectively. Whether it is the US military or Canadian military, people – even at the HQ level – do not understand the value in communications, and that is a training failure.

Dr. Moore observed that, when we talk about the problems of communications and communicating effectively in-theatre, it comes back to stories and narratives, that we do not understand the narratives of the population or the ANSA. He cited Taliban propaganda, and how they are rather loose with the truth. There is an incident involving allied forces, for example, and the Taliban will exaggerate the numbers of civilian casualties suffered. We are outraged at the lies, but we are missing the point. It does not matter if what they say is strictly true or not. The key is whether it resonates with the target population, does it fit in with their narrative. That is what we have to understand. It is this dimension that Dr. Moore thought we are missing because we have a different narrative, one that emphasizes the primacy of factual truth in the stories we tell (or, at least we like to think it does). This brings us back to the question of stories and competing narratives.

With respect to communication as a research area, one participant introduced the idea of rumours as a social agent. How does communication spread through a population? Some people believe very strange rumours. So, we need to understand how rumours spread, how information is received by various populations — even when people spread mistruths or exaggerations. If you want to spread your information, you have to know how that message spreads.

One of the reasons our PSYOPS information has been hard to quantify in terms of effectiveness [in Afghanistan], one participant observed, is that they know it is *us* saying it. What we managed to do, he said, was to get some key Afghan figures on our side. The minister of religious affairs, for example, put in place a training program to counteract the Taliban's "reason for being" from a religious perspective. Another example, in response to the alleged Qur'an burning incident, the minister came on the airways and said "this is not right; the Americans are not doing this". That works. Us saying it does not.

What do operators' need?

One participant wanted to know the *emerging trends* of what ANSAs are going to look like in the future. We also need *enduring principles*. We need something that is *user-friendly*: "keep it simple, stupid", soldier-proof. Returning to the question of training, we need naturalistic decision making. The soldier has to be trained to react. The training mechanism gives him all these things to think about before he goes on his mission, and when he gets to his mission he has four or five different things to work from as he goes forward. Last point, this is much more than the soldier. It is *multi-agency*. How do we influence the ANSA using more than just a military solution? These, then, are the four key things this participant would like to see come from the Project: enduring principles; emerging trends; a user-friendly tool; and, more than a military solution.

Another participant asked how group identity transcends group thinking or the pattern of thinking, because that would tell him in tactical and operational situations how they determine things and figure out things. He needs help to understand their end-state, through their manifestos, choice of group name, how they behave, etc., so that he can understand their thought process and project how they will select targets, for, say, force protection. And, if I understand them, he said, then I can reverse engineer it and understand what is required of that end-state and start taking away that ability. That is what I want and that is what I need.

One participant wondered whether the intent of the Project is to do analysis globally and tell us what ANSAs are doing in the world, or to come up with processes and methodologies to build and analyze what they are doing? As intelligence operators, we already look at the bad guys, try to understand what they are doing, and make predictions on where they are going to go and what they are going to do. Are you giving us tools to analyze this better and get through all this data, or are you giving us a biography of all the ANSAs in the world?

Dr. Moore insisted that it was definitely not the latter. What we are trying to do, he said, is to help operators do an already good job a little better by offering some insights that might help them look at the problem in a different way.

The participant responded that, rather than looking at the problem in a different way, it has got to be from a *better* way. We have a good process in terms of how we take a complex problem, break it down into pieces and then analyze it to come up with assessments. There is a lot of information out there. What are the things I need to know about when I am analyzing this problem? he asked. At the end of the day, I have to come up with what I think the bad guys are going to do, because my commander is trying to make decisions on operations, force protection, etc. I have to make recommendations and figure out if these bad guys are going to give us a bad day.

Another participant noted that, before the armies get involved, before the government says we are going in somewhere, there is some activity going on in the world. Who is analyzing this beforehand? How do we determine that this or that group of actors is going to cause some problems? It is at the strategic level, before the army gets involved. Once the armies are sent in to theatre, it is always about kill or capture. We are starting to look at new ways of targeting. You do not always have to kill these guys. There are other ways of influencing these guys to stop them from doing what they are doing. What the Project is doing is building these models or tools that allow the operator to analyze this stuff, making it better for everyone.

What we can take from these comments, Dr. Moore said, is that we need a whole-of-government approach from a strategic level to analyze conflict situations, before we get to the operational level where the problem has been turned over to the military. The audience for the kind of work we are doing is not just the military, but agencies like IAS/PCO [Intelligence Assessment Staff/Privy Council Office] who do precisely this kind of strategic-level intelligence analysis. We need to make links with other groups and agencies like DFAIT, NGOs and CSIS, to plug in on a strategic level of intelligence assessment.

Connection to the red teaming study

It was noted that one of the tasks of the support network for red-teaming is to support the ANSA Project. The support the Project needs is the academic reach-back multidisciplinary support to

provide the case information needed for content. Two suggestions were offered. First, the RTASN [Red Team Academic Support Network – see M. Lauder's presentation above] should make its case the same as the Project's, that is, primarily Somalia-focused. We also understand that we are looking for generic and future-oriented elements of that. We need to include some of the dimensions that have already been mentioned in the workshop here. There are community dynamics, there are ways of modeling proxy communities if you cannot tap groups directly – you cannot actually get into al-Shabaab, but you can get into Somali-Canadian communities. There are templates for consulting with, and learning about, the community dynamics of the Somali-Canadian community. That is the dialogue that we need to have on the connection between the two projects. To what extent do we want operators involved in that – intelligence cells, future force developers – or do we want the whole-of-government? If the answer is 'all of the above', then what are the "plumbing issues" of how to make those groups come together? A workshop or series of workshops with open source, unclassified, Chatham House rules? Is this the right track?

Dr. Moore thought it was on both counts. He went on to explain, for the benefit of the group, the connection between the red teaming and TIF projects. The TIF Project is a stakeholder in the red teaming study. What the RTASN has been asked to do is to address the question of the impact of clan and Islamic identity in the Somali community, as a pilot piece, a background piece, to the work planned for Phase 2 of the Project, with Somalia and the Somali Islamist ANSA, al-Shabaab, as the case study focus. Why this focus on the Horn of Africa? There are a lot of nasty places in the world, but from discussions with the CF, it seems that the Horn is an area of concern for the CF. We are cooperating with the red teaming study to generate some initial information on identity issues in the Somali community on which we can build in the next phase of the Project.

Population dynamics and group identities

A participant asked whether we are looking at ANSAs or population dynamics as a whole? The two are not separable, in his opinion. The state matters because what the state does certainly influences the group and group behaviours. You have to have the key moving parts to understand what groups do, to understand the context.

Another participant observed that an ANSA is part of a larger population and most ANSA members have other group identities rooted in various groups. How important is an ANSA member's group identity when he is in another group? When he is being a father, a husband, or a farmer, how prevalent is that group identity when you are addressing him? Is that perhaps one of the times when you can better influence an ANSA member – when he is not in the "I am a criminal" but in a farmer mode? More broadly, how is a member of an ANSA different from a member of the normal population? Can you tell from his behaviour? Are there cues or indicators that say "this guy is more likely to be an insurgent or an ANSA member than a member of another group"?

Others picked up on this theme. One noted that there are key triggers and mobilization aspects that have been studied to an extent, but that joining an ANSA is a slippery slope. Militants are drawn into a group [through their social networks, for example], while other times there are significant triggers in terms of trauma or certain events that drive them one way or the other.

One participant noted that, in terms of inherent factors, there are certain personality factors, e.g., narcissism, that have been keyed on, to tell us who is going to be violent, but most of that has

come up empty. Another added that there are many other contextual things that could affect a person's reactions.

Dr. Taylor stated that, with respect to multiple and shifting identities, they are so fluid and, hence, unpredictable. This brings him to a broader issue, he continued. We have been talking about the different positions, as an academic and an operator, and trying to understand those cultural and agenda differences. There is a place where we come together. Being a soldier today is a challenging business. You have to be a soldier, a psychologist, a sociologist, an anthropologist, a social worker and a part-time engineer. The variety of skills you need, what you are being asked to do emotionally and intellectually, and to do it quickly with information overload, in a world that we do not understand very well, is amazing. The scientist, on the other hand, we are drawn to some of these issues precisely because we do not understand them, starting with why do people engage in such extreme acts? It does not make sense. And then we discover that, yes, it does. When there is no simple explanation, when we see normal processes and their complexities and our inability to understand them, it is like a magnet for us.

At the end of this Project, he said, I'm hoping you will think differently. You will just be that much more multi-talented and multi-faceted to deal with it. Being emotionally and cognitively equipped, the better you are. This is what is satisfying to us as scientists.

With those final thoughts, Dr. Moore brought the panel discussion to a close.

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Annex A Presenters' Bios

JAMES MOORE earned his Ph.D. in Political Science from the Massachusetts Institute of Technology in 1991. He also earned an LL.M. in Public International Law from Osgoode Hall Law School, York University, in 2006. He was an Adjunct Professor at Osgoode Hall Law School in 2003, teaching an undergraduate seminar course on the moral, legal and political dilemmas in the Global War on Terror. He was also a sessional lecturer at the Norman Paterson School of International Affairs, Carleton University, from 1991 to 1994, teaching graduate seminars in international organization, international negotiation and post-Cold War national security issues. Currently, James is a Defence Scientist in the Adversarial Intent Section at DRDC Toronto, after twenty years as a Strategic Analyst responsible for research and reporting on the Middle East with the Directorate of Strategic Analysis/DRDC CORA in Ottawa. Research included development of an innovative quantitative model for equitable sharing of scarce water resources in Israel/Palestine that remains one of the standard references in the field. Current projects include developing a conceptual framework for understanding the motivations, intentions and behaviour of Armed Non-state Actors (ANSAs), as well as an extensive semantic analysis of the NATO definition of the term 'adversary'.

MATTHEW LAUDER is cultural theorist and applied social anthropologist who earned his BAH in Psychology and Religious Studies at Queen's University, a Master's in Religion and Culture at Wilfrid Laurier University, and a Master's of Philosophy (MPhil) in Religious Studies from Lancaster University (UK), specialising in religious and political extremism. He is currently a Defence Scientist in the Adversarial Intent Section, DRDC Toronto and an Adjunct Professor, Defence and Security Research Institute (DSRI) at the Royal Military College of Canada. Matthew's area of research includes the socio-cultural context of conflict (human domain analysis), threat emulation and decision-support red teaming, influence activities, theories and approaches to irregular warfare, and radicalization and extremism. He is manager for the project "CF Enhanced Influence Operations", which seeks to critically examine and develop an offensive and defensive influence capability for application in expeditionary environments. Matthew recently returned from Afghanistan where he conducted research in support of J2, CEFCOM and the Decision Support Red Team (DSRT), Combined Joint Task Force 82 – Regional Command East. He is also an Infantry Officer in The Argyll and Sutherland Highlanders of Canada (PL).

DONALD TAYLOR is a social psychologist who earned his Ph.D. in Psychology from the University of Western Ontario in 1969. Currently, he is a Full Professor in the Department of Psychology at McGill University, where he has been a faculty member since 1969, teaching social psychology and intergroup relations. Over the course of his career, he has published 6 books, over 50 book chapters and authored or co-authored over 100 peer-reviewed articles concerning a variety of social-psychological processes, ranging from prejudice and discrimination, to collective action by society's more disadvantaged groups. His seminal book, *Theories of Intergroup Relations* (1994), has been the university textbook of choice for this subject. He has been awarded 40 external research grants, the most recent being a four-year F.Q.R.S.C. grant beginning in 2005 to study identity and social dysfunction, valued at over \$360,000. His research has involved field work with insurgents in the Philippines and Indonesia. He was the 2006 recipient of the Canadian Psychological Association's award for distinguished contributions to public and community service, and the 2005 recipient of the Principal's Prize for Excellence in Teaching.

MICHAEL WOHL is an Associate Professor of Psychology at Carleton University. He received his undergraduate degree in Psychology at the University of Winnipeg in 1998 and his Ph.D. in Social Psychology at the University of Alberta in 2003. His research focuses on the causes and consequences of harmdoing at both the interpersonal (one person transgressing against another) and intergroup level (historical and contemporary harm experienced by members of one group at the hands of another group). This research examines, among other things, the emotional reaction that stems from harming or being harmed (e.g., anxiety, guilt) and their effects on psychological and physical health. Ultimately, Wohl's work is oriented toward forgiveness and reconciliation. Wohl also does research on the factors that contribute to addiction (smoking, gambling) and refusal to seek treatment. The majority of this work has focused on stress and coping responses, erroneous cognitions, and craving as predictors of continued addictive behaviour. Michael has published over 40 peer-reviewed papers and is the recipient of Carleton's Research Achievement Award. Funding for his research has come from the Social Sciences and Humanities Research Council, and the Canadian Foundation for Innovation.

MICHAEL KING is a doctoral student in the psychology department at McGill University. His research focuses on intergroup conflict and terrorism, more specifically, on identifying the factors that contribute to the psychological legitimization of violence. In the laboratory, he conducts controlled role-playing scenarios, manipulating variables that are thought to justify violence. In the field, he collects the narratives of people who engage in terrorism, and their families, in hopes of understanding the social influences involved. He has co-authored *The Edge of Violence: A Radical Approach to Extremism*, in collaboration with the British think-tank Demos.

EDUARDO SALAS received his Ph.D. degree (1984) in industrial and organizational psychology from Old Dominion University. He is University Trustee Chair and Pegasus Professor of Psychology at the University of Central Florida (UCF). He also holds an appointment as Program Director for Human Systems Integration Research Department at UCF's Institute for Simulation & Training. Previously, Eduardo was a Senior Research Psychologist and Head of the Training Technology Development Branch of NAVAIR-Orlando for 15 years. His expertise includes helping organizations on how to foster teamwork, design and implement team training strategies, facilitate training effectiveness, manage decision making under stress, develop performance measurement tools, and design learning and simulation-based environments. He is currently working on designing tools, instructional strategies and techniques to minimize human errors in aviation, law enforcement and medical environments. He has co-authored over 350 journal articles and book chapters and has co-edited over 20 books, and is on/has been on the editorial boards of over a dozen respected journals. He has consulted widely to a variety of manufacturing, pharmaceutical laboratories, industrial and governmental organizations.

LAURIE FENSTERMACHER has Physics and Electrical Engineering degrees from Ohio State University, South Dakota School of Mines and Technology, and Syracuse University. She was active duty military for nine years, and assumed her current civilian position in September 2002 as the Influence sub-CTC lead in the Anticipate and Influence Division of the Human Effectiveness Directorate of the Air Force Research Laboratory (AFRL). She is the Program Manager for Cascading Air Power Effects and Discourse Analysis programs and the government team lead for the DARPA Integrated Conflict and Early Warning System program (forecasting nation instability and development of mitigation strategies). She is also a member of the core Strategic Multilayer Assessment Team, supporting numerous multi-agency and multi-discipline quick reaction projects for Combatant Commands. She has published a number of publications on

speaker identification, voice transformation and platform identification, and is also editor of a major counter-terrorism White Paper highlighting the state-of-the-knowledge on terrorism, the role of ideology and potential counter-radicalization and disengagement solutions. She is a member of two NATO research groups focused on terrorism and psycho-social methods and models for Effects Based Operations.

RIK WARREN holds a PhD in Experimental Psychology from Cornell University. He is in the Behavior Modeling branch of the Air Force Research Laboratory and advises on the effects of culture on cognition, Patterns of Life, culturally influenced communication effects, and models of cultural conflict and cooperation. He was the Program Manager for SABRE: A game-based testbed for culture and personality research on cultural interaction using a role-play computer game. He is currently using SABRE to collect data for an agent-based model of dyadic cultural conflict and cooperation. He was a member of NATO's Human Factors and Medicine panel HFM-138 (Leader and Team Adaptability in Multinational Coalitions), which conducted a large-scale experiment on intercultural factors in teamwork. Previously, he was the Associate to the Chief Scientist of the Human Effectiveness Directorate (1998-2004). He is on the editorial boards of the International Journal of Ecological Psychology and the International Journal of Aviation Psychology. He is a member of the Psychonomic Society, the International Association for Cross-Cultural Psychology, and the International Society for Ecological Psychology. In Addition to culture, his interests include perception and language. He edited (with Alex Wertheim) Perception & Control of Self-Motion (1990).

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